Iuliana P Radu

List of Publications by Year
in descending order

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200	7,238	57758	64796
papers	citations	44 h-index	79 g-index

201	201	201	8695
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Ab initio study of ultrafast spin dynamics in Gdx(FeCo)1â^'x alloys. Applied Physics Letters, 2022, 120, .	3.3	5
2	Magnetic field sensitivity of the photoelectrically read nitrogen-vacancy centers in diamond. Applied Physics Letters, 2022, 120, 162402.	3.3	1
3	Linking Room- and Low-Temperature Electrical Performance of MOS Gate Stacks for Cryogenic Applications. IEEE Electron Device Letters, 2022, 43, 674-677.	3.9	2
4	Understanding ambipolar transport in MoS₂ field effect transistors: the substrate is the key. Nanotechnology, 2021, 32, 135202.	2.6	14
5	Impact of device scaling on the electrical properties of MoS2 field-effect transistors. Scientific Reports, 2021, 11, 6610.	3.3	33
6	Fabrication and room temperature characterization of trilayer junctions for the development of superconducting qubits on 300 mm wafers. Japanese Journal of Applied Physics, 2021, 60, SBBI04.	1.5	7
7	Electrical spin-wave spectroscopy in nanoscale waveguides with nonuniform magnetization. Applied Physics Letters, 2021, 118, .	3.3	8
8	All-Electrical Control of Scaled Spin Logic Devices Based on Domain Wall Motion. IEEE Transactions on Electron Devices, 2021, 68, 2116-2122.	3.0	6
9	Magnonic band structure in CoFeB/Ta/NiFe meander-shaped magnetic bilayers. Applied Physics Letters, 2021, 118, .	3.3	16
10	Measurement of direct and indirect bandgaps in synthetic ultrathin MoS2 and WS2 films from photoconductivity spectra. Journal of Applied Physics, 2021, 129, .	2.5	5
11	Processing Stability of Monolayer WS₂ on SiO₂. Nano Express, 2021, 2, 024004.	2.4	1
12	Internal photoemission of electrons from 2D semiconductor/3D metal barrier structures. Journal Physics D: Applied Physics, 2021, 54, 295101.	2.8	1
13	Engineering Wafer-Scale Epitaxial Two-Dimensional Materials through Sapphire Template Screening for Advanced High-Performance Nanoelectronics. ACS Nano, 2021, 15, 9482-9494.	14.6	26
14	Nanoscale domain wall devices with magnetic tunnel junction read and write. Nature Electronics, 2021, 4, 392-398.	26.0	46
15	On MX2-based metal-oxide-semiconductor device capacitance-voltage characteristics and dual-gate operation. , 2021, , .		0
16	The 2021 ultrafast spectroscopic probes of condensed matter roadmap. Journal of Physics Condensed Matter, 2021, 33, 353001.	1.8	55
17	Contact Interface Characterization of Graphene contacted MoS2 FETs. , 2021, , .		0
18	Low dephasing and robust micromagnet designs for silicon spin qubits. Applied Physics Letters, 2021, 119, .	3.3	11

#	Article	IF	Citations
19	Interface admittance measurement and simulation of dual gated CVD WS2 MOSCAPs: Mapping the DIT(E) profile. Solid-State Electronics, 2021, 183, 108035.	1.4	0
20	Magnonic Band Structure in Vertical Meander-Shaped <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline" overflow="scroll"><mml:msub><mml:mi>Co</mml:mi><mml:mn>40</mml:mn></mml:msub></mml:math> <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline" overflow="scroll"><mml:msub><mml:mi>Fe</mml:mi><mml:mn>40</mml:mn></mml:msub></mml:math> <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline" overflow="scroll"><m	3.8	17
21	Graphene based Van der Waals contacts on MoS₂ field effect transistors. 2D Materials, 2021, 8, 015003.	4.4	15
22	Efficient Modeling of Charge Trapping at Cryogenic Temperaturesâ€”Part I: Theory. IEEE Transactions on Electron Devices, 2021, 68, 6365-6371.	3.0	6
23	Efficient Modeling of Charge Trapping at Cryogenic Temperaturesâ€”Part II: Experimental. IEEE Transactions on Electron Devices, 2021, 68, 6372-6378.	3.0	3
24	High mobility SiMOSFETs fabricated in a full 300Âmm CMOS process. Materials for Quantum Technology, 2021, 1, 041001.	3.1	5
25	MoS₂/MoTe₂ Heterostructure Tunnel FETs Using Gated Schottky Contacts. Advanced Functional Materials, 2020, 30, 1905970.	14.9	50
26	Quantum Mechanical Charge Trap Modeling to Explain BTI at Cryogenic Temperatures. , 2020, , .		4
27	Reliability and Variability of Advanced CMOS Devices at Cryogenic Temperatures. , 2020, , .		31
28	Reconfigurable submicrometer spin-wave majority gate with electrical transducers. Science Advances, 2020, 6, .	10.3	50
29	Back hopping in spin transfer torque switching of perpendicularly magnetized tunnel junctions. Physical Review B, 2020, 102, .	3.2	19
30	An Integrated Silicon MOS Single-Electron Transistor Charge Sensor for Spin-Based Quantum Information Processing. IEEE Electron Device Letters, 2020, 41, 1253-1256.	3.9	7
31	A MOS capacitor model for ultra-thin 2D semiconductors: the impact of interface defects and channel resistance. 2D Materials, 2020, 7, 035018.	4.4	11
32	Analysis of Transferred MoS₂ Layers Grown by MOCVD: Evidence of Mo Vacancy Related Defect Formation. ECS Journal of Solid State Science and Technology, 2020, 9, 093001.	1.8	9
33	Sources of variability in scaled MoS₂ FETs. , 2020, , .		11
34	A flexible 300 mm integrated Si MOS platform for electron- and hole-spin qubits exploration. , 2020, , .		15
35	Future Logic Scaling: Towards Atomic Channels and Deconstructed Chips. , 2020, , .		49
36	3D Sequential Low Temperature Top Tier Devices using Dopant Activation with Excimer Laser Anneal and Strained Silicon as Performance Boosters. , 2020, , .		9

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37	TCAD-Assisted MultiPhysics Modeling & Simulation for Accelerating Silicon Quantum Dot Qubit Design. , 2020, , .		2
38	Two-dimensional WS2 crystals at predetermined locations by anisotropic growth during atomic layer deposition. Journal of Applied Physics, 2020, 128, .	2.5	6
39	Electronic voltage control of magnetic anisotropy at room temperature in high- <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:mi>Î</mml:mi></mml:math> <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:msub><mml:mrow><mml:mi>SrTiO</mml:mi></mml:mrow><mml:mn> trilayer. Physical Review Materials, 2020, 4, .	2.4	10
40	Performance Comparison of s-Si, In0.53Ga0.47As, Monolayer BP- and WS2-Based n-MOSFETs for Future Technology Nodesâ€”Part II: Circuit-Level Comparison. IEEE Transactions on Electron Devices, 2019, 66, 3614-3619.	3.0	0
41	Device and Circuit Level Gate Configuration Optimization for 2D Material Field-Effect Transistors. , 2019, , .		2
42	Ultrafast Magnetic Recording With Terahertz Light. , 2019, , .		0
43	Ferroelectric Control of Magnetism in Ultrathin HfO₂CoPt Layers. ACS Applied Materials & Interfaces, 2019, 11, 34385-34393.	8.0	10
44	Evaluation of the effective work-function of monolayer graphene on silicon dioxide by internal photoemission spectroscopy. Thin Solid Films, 2019, 674, 39-43.	1.8	7
45	Spin-on-diffussants for doping in transition metal dichalcogenide semiconductors. Applied Physics Letters, 2019, 114, 212102.	3.3	1
46	Performance Comparison of s-Si, In_{0.53}Ga_{0.47}As, Monolayer BP, and WS₂-Based n-MOSFETs for Future Technology Nodesâ€”Part I: Device-Level Comparison. IEEE Transactions on Electron Devices, 2019, 66, 3608-3613.	3.0	3
47	Analysis of admittance measurements of MOS capacitors on CVD grown bilayer MoS ₂. 2D Materials, 2019, 6, 035035.	4.4	19
48	A route towards the fabrication of 2D heterostructures using atomic layer etching combined with selective conversion. 2D Materials, 2019, 6, 035030.	4.4	6
49	Chemical vapor deposition of monolayer-thin WS2 crystals from the WF6 and H2S precursors at low deposition temperature. Journal of Chemical Physics, 2019, 150, 104703.	3.0	11
50	Tunnel FETs using Phosphorene/ReS2 heterostructures. , 2019, , .		1
51	Ultra-scaled MOCVD MoS₂ MOSFETs with 42nm contact pitch and 250ÂµA/Âµm drain current. , 2019, , .		46
52	The Growing Application Field of Laser Debonding: From Advanced Packaging to Future Nanoelectronics. , 2019, , .		8
53	Impact of MoS₂ layer transfer on electrostatics of MoS₂/SiO₂ interface. Nanotechnology, 2019, 30, 055702.	2.6	11
54	Patterning challenges for beyond 3nm logic devices: example of an interconnected magnetic tunnel junction. , 2019, , .		0

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55	Selective THz control of magnetic order: new opportunities from superradiant undulator sources. Journal Physics D: Applied Physics, 2018, 51, 114007.	2.8	30
56	Relation between film thickness and surface doping of MoS2 based field effect transistors. APL Materials, 2018, 6, .	5.1	9
57	MoS2 synthesis by gas source MBE for transition metal dichalcogenides integration on large scale substrates. Journal of Applied Physics, 2018, 123, .	2.5	26
58	Fabrication of magnetic tunnel junctions connected through a continuous free layer to enable spin logic devices. Japanese Journal of Applied Physics, 2018, 57, 04FN01.	1.5	12
59	Wide operating window spin-torque majority gate towards large-scale integration of logic circuits. AIP Advances, 2018, 8, 055920.	1.3	7
60	Interconnected magnetic tunnel junctions for spin-logic applications. AIP Advances, 2018, 8, .	1.3	10
61	Material-Device-Circuit Co-Design of 2-D Materials-Based Lateral Tunnel FETs. IEEE Journal of the Electron Devices Society, 2018, 6, 979-986.	2.1	8
62	Towards high-performance polarity-controllable FETs with 2D materials. , 2018, , .		4
63	Tunneling Transistors Based on MoS₂/MoTe₂ Van der Waals Heterostructures. IEEE Journal of the Electron Devices Society, 2018, 6, 1048-1055.	2.1	33
64	Nucleation and growth mechanism of 2D SnS ₂ by chemical vapor deposition: initial 3D growth followed by 2D lateral growth. 2D Materials, 2018, 5, 035006.	4.4	23
65	The conversion mechanism of amorphous silicon to stoichiometric WS₂. Journal of Materials Chemistry C, 2018, 6, 4122-4130.	5.5	9
66	Microwave Characterization of Ba-Substituted PZT and ZnO Thin Films. IEEE Transactions on Ultrasonics, Ferroelectrics, and Frequency Control, 2018, 65, 881-888.	3.0	8
67	Nucleation mechanism during WS2 plasma enhanced atomic layer deposition on amorphous Al2O3 and sapphire substrates. Journal of Vacuum Science and Technology A: Vacuum, Surfaces and Films, 2018, 36, .	2.1	30
68	First experimental demonstration of a scalable linear majority gate based on spin waves. , 2018, , .		8
69	Scaled spintronic logic device based on domain wall motion in magnetically interconnected tunnel junctions. , 2018, , .		7
70	Spin-based majority gates for logic applications. , 2018, , .		0
71	Instant-On Spin Torque in Noncollinear Magnetic Tunnel Junctions. Physical Review Applied, 2018, 10, .	3.8	14
72	Interconnect-Device Co-Optimization for Field-Effect Transistors with Two-Dimensional Materials. , 2018, , .		1

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73	Understanding Energy Efficiency Benefits of Carbon Nanotube Field-Effect Transistors for Digital VLSI. IEEE Nanotechnology Magazine, 2018, 17, 1259-1269.	2.0	87
74	Chain of magnetic tunnel junctions as a spintronic memristor. Journal of Applied Physics, 2018, 124, .	2.5	18
75	3-D Sequential Stacked Planar Devices Featuring Low-Temperature Replacement Metal Gate Junctionless Top Devices With Improved Reliability. IEEE Transactions on Electron Devices, 2018, 65, 5165-5171.	3.0	12
76	Spin-Wave Emission by Spin-Orbit-Torque Antennas. Physical Review Applied, 2018, 10, .	3.8	21
77	Two-Dimensional Crystal Grain Size Tuning in WS₂ Atomic Layer Deposition: An Insight in the Nucleation Mechanism. Chemistry of Materials, 2018, 30, 7648-7663.	6.7	57
78	The Role of Nonidealities in the Scaling of MoS₂ FETs. IEEE Transactions on Electron Devices, 2018, 65, 4635-4640.	3.0	14
79	Spin-torque-driven MTJs with extended free layer for logic applications. Journal Physics D: Applied Physics, 2018, 51, 275002.	2.8	5
80	Formation mechanism of 2D SnS₂ and SnS by chemical vapor deposition using SnCl₄ and H₂S. Journal of Materials Chemistry C, 2018, 6, 6172-6178.	5.5	56
81	Doping-Free Complementary Logic Gates Enabled by Two-Dimensional Polarity-Controllable Transistors. ACS Nano, 2018, 12, 7039-7047.	14.6	104
82	Layer-controlled epitaxy of 2D semiconductors: bridging nanoscale phenomena to wafer-scale uniformity. Nanotechnology, 2018, 29, 425602.	2.6	48
83	Thermal recrystallization of short-range ordered WS2 films. Journal of Vacuum Science and Technology A: Vacuum, Surfaces and Films, 2018, 36, .	2.1	7
84	Doping-free complementary inverter enabled by 2D WSe2 electrostatically-doped reconfigurable transistors. , 2018, , .		0
85	Unidirectional light-emission from in-plane tunneling nanoantennas (Conference Presentation). , 2018, , .		0
86	Two-dimensional WS₂nanoribbon deposition by conversion of pre-patterned amorphous silicon. Nanotechnology, 2017, 28, 04LT01.	2.6	18
87	On the electrostatic control achieved in transistors based on multilayered MoS2: A first-principles study. Journal of Applied Physics, 2017, 121, .	2.5	18
88	Non-volatile spin wave majority gate at the nanoscale. AIP Advances, 2017, 7, .	1.3	31
89	Toward an Understanding of the Electric Field-Induced Electrostatic Doping in van der Waals Heterostructures: A First-Principles Study. ACS Applied Materials & Interfaces, 2017, 9, 7725-7734.	8.0	20
90	Scaling trends and performance evaluation of 2-dimensional polarity-controllable FETs. Scientific Reports, 2017, 7, 45556.	3.3	13

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91	Paramagnetic Intrinsic Defects in Polycrystalline Large-Area 2D MoS2 Films Grown on SiO2 by Mo Sulfurization. Nanoscale Research Letters, 2017, 12, 283.	5.7	12
92	Highly efficient and stable MoS₂FETs with reversible n-doping using a dehydrated poly(vinyl-alcohol) coating. Nanoscale, 2017, 9, 258-265.	5.6	40
93	FETs on 2-D Materials: Deconvolution of the Channel and Contact Characteristics by Four-Terminal Resistance Measurements on WSe2Transistors. IEEE Transactions on Electron Devices, 2017, 64, 2970-2976.	3.0	3
94	(Invited) Electrical Atomic Force Microscopy for 2D Transition Metal Dichalcogenide Materials. ECS Transactions, 2017, 77, 41-47.	0.5	1
95	Low Energy Phosphorus Plasma Implantation for Isolation of MoS 2 Devices. ECS Transactions, 2017, 77, 3-8.	0.5	1
96	Demonstration of 2e12 cmâ^'2eVâ^'1 2D-oxide interface trap density on back-gated MoS2 flake devices with 2.5 nm EOT. Microelectronic Engineering, 2017, 178, 145-149.	2.4	9
97	Operating conditions and stability of spin torque majority gates: Analytical understanding and numerical evidence. Journal of Applied Physics, 2017, 121, .	2.5	8
98	Plasma-Enhanced Atomic Layer Deposition of Two-Dimensional WS₂ from WF₆, H₂ Plasma, and H₂S. Chemistry of Materials, 2017, 29, 2927-2938.	6.7	74
99	Nucleation and growth mechanisms of Al2O3 atomic layer deposition on synthetic polycrystalline MoS2. Journal of Chemical Physics, 2017, 146, 052810.	3.0	41
100	Electrically Driven Unidirectional Optical Nanoantennas. Nano Letters, 2017, 17, 7433-7439.	9.1	56
101	(Invited) Internal Photoemission of Electrons from 2-Dimensional Semiconductors. ECS Transactions, 2017, 80, 191-201.	0.5	12
102	Exchange-driven Magnetic Logic. Scientific Reports, 2017, 7, 12154.	3.3	17
103	Terahertz Spin Currents and Inverse Spin Hall Effect in Thin-Film Heterostructures Containing Complex Magnetic Compounds. Spin, 2017, 07, 1740010.	1.3	65
104	From the metal to the channel: a study of carrier injection through the metal/2D MoS₂interface. Nanoscale, 2017, 9, 10869-10879.	5.6	54
105	MoS₂ Functionalization with a Sub-nm Thin SiO₂ Layer for Atomic Layer Deposition of High-Î¹ Dielectrics. Chemistry of Materials, 2017, 29, 6772-6780.	6.7	27
106	Improving MOCVD MoS₂Electrical Performance: Impact of Minimized Water and Air Exposure Conditions. IEEE Electron Device Letters, 2017, 38, 1606-1609.	3.9	33
107	Micromagnetic simulations of magnetoelastic spin wave excitation in scaled magnetic waveguides. Applied Physics Letters, 2017, 111, .	3.3	27
108	Material selection and device design guidelines for two-dimensional materials based TFETs. , 2017, , .		1

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109	Material-Device-Circuit Co-optimization of 2D Material based FETs for Ultra-Scaled Technology Nodes. Scientific Reports, 2017, 7, 5016.	3.3	16
110	Transistors on two-dimensional semiconductors: contact resistance limited by the contact edges. , 2017, , .		4
111	Spin waves for interconnect applications. , 2017, , .		2
112	Modulating the resistivity of MoS2 through low energy phosphorus plasma implantation. Applied Physics Letters, 2017, 110, .	3.3	15
113	Doping of graphene for the application in nano-interconnect. Microelectronic Engineering, 2017, 167, 42-46.	2.4	12
114	Evaluation of multilayer graphene for advanced interconnects. Microelectronic Engineering, 2017, 167, 1-5.	2.4	9
115	Benchmarking of monolithic 3D integrated MX<inf>2</inf> FETs with Si FinFETs. , 2017, , .		12
116	Perpendicular magnetic anisotropy of CoFeBTa bilayers on ALD HfO2. AIP Advances, 2017, 7, 055933.	1.3	8
117	Proposal for nanoscale cascaded plasmonic majority gates for non-Boolean computation. Scientific Reports, 2017, 7, 17866.	3.3	19
118	Tunneling transistors based on MoS₂/MoTe₂ Van der Waals heterostructures. , 2017, , .		2
119	WS<inf>2</inf> transistors on 300 mm wafers with BEOL compatibility. , 2017, , .		24
120	Controlled Sulfurization Process for the Synthesis of Large Area MoS₂ Films and MoS₂/WS₂ Heterostructures. Advanced Materials Interfaces, 2016, 3, 1500635.	3.7	61
121	Structural and magnetic characterization of large area, free-standing thin films of magnetic ion intercalated dichalcogenides Mn_{0.25}TaS₂and Fe_{0.25}TaS₂. Journal of Physics Condensed Matter, 2016, 28, 356002.	1.8	11
122	Insight on the Characterization of MoS₂Based Devices and Requirements for Logic Device Integration. ECS Journal of Solid State Science and Technology, 2016, 5, Q3072-Q3081.	1.8	28
123	Origin of the performances degradation of two-dimensional-based metal-oxide-semiconductor field effect transistors in the sub-10â€‰nm regime: A first-principles study. Applied Physics Letters, 2016, 108, .	3.3	5
124	Comparison of short-channel effects in monolayer MoS2 based junctionless and inversion-mode field-effect transistors. Applied Physics Letters, 2016, 108, 023506.	3.3	17
125	Molecular doping of MoS2 transistors by self-assembled oleylamine networks. Applied Physics Letters, 2016, 109, .	3.3	41
126	Transport properties of chemically synthesized MoS2 â€“ Dielectric effects and defects scattering. Applied Physics Letters, 2016, 109, 233102.	3.3	12

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127	All electrical propagating spin wave spectroscopy with broadband wavevector capability. Applied Physics Letters, 2016, 109, .	3.3	64
128	Perpendicular magnetic anisotropy of CoPt bilayers on ALD HfO2. Journal of Applied Physics, 2016, 120, .	2.5	8
129	Polarity control in WSe2 double-gate transistors. Scientific Reports, 2016, 6, 29448.	3.3	63
130	Toward error-free scaled spin torque majority gates. AIP Advances, 2016, 6, .	1.3	15
131	Efficient metallic spintronic emitters of ultrabroadband terahertz radiation. Nature Photonics, 2016, 10, 483-488.	31.4	605
132	Demonstration of Direction Dependent Conduction through MoS₂Films Prepared by Tunable Mass Transport Fabrication. ECS Journal of Solid State Science and Technology, 2016, 5, Q3046-Q3049.	1.8	5
133	Multi-layer graphene interconnect. , 2016, , .		0
134	High-Field High-Repetition-Rate Sources for the Coherent THz Control of Matter. Scientific Reports, 2016, 6, 22256.	3.3	121
135	Effect of material parameters on two-dimensional materials based TFETs: An energy-delay perspective. , 2016, , .		1
136	Effect of material parameters on two-dimensional materials based TFETs: An energy-delay perspective. , 2016, , .		8
137	Overview of spin-based majority gates and interconnect implications. , 2016, , .		1
138	Single- and multilayer graphene wires as alternative interconnects. Microelectronic Engineering, 2016, 156, 131-135.	2.4	16
139	Multilayer MoS₂ growth by metal and metal oxide sulfurization. Journal of Materials Chemistry C, 2016, 4, 1295-1304.	5.5	57
140	Probing Ultrafast Magnetization Dynamics with High-Harmonic Magnetic Circular Dichroism. , 2016, , .		0
141	Spintronic majority gates. , 2015, , .		19
142	Probing ultrafast spin dynamics with high-harmonic magnetic circular dichroism spectroscopy. Physical Review B, 2015, 92, .	3.2	63
143	Transition metal contacts to graphene. Applied Physics Letters, 2015, 107, .	3.3	34
144	Influence of the Magnetization Compensation Point on the All-Optical Magnetization Switching. Springer Proceedings in Physics, 2015, , 30-31.	0.2	0

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145	Benchmarking of MoS₂FETs With Multigate Si-FET Options for 5 nm and Beyond. IEEE Transactions on Electron Devices, 2015, 62, 4051-4056.	3.0	29
146	Graphene wires as alternative interconnects. , 2015, , .		6
147	Area and routing efficiency of SWD circuits compared to advanced CMOS. , 2015, , .		4
148	Design and benchmarking of hybrid CMOS-Spin Wave Device Circuits compared to 10nm CMOS. , 2015, , .		34
149	(Invited) Heterogeneous Nano- to Wide-Scale Co-Integration of Beyond-Si and Si CMOS Devices to Enhance Future Electronics. ECS Transactions, 2015, 66, 3-14.	0.5	6
150	High-quality, large-area MoSe₂ and MoSe₂/Bi₂Se₃ heterostructures on AlN(0001)/Si(111) substrates by molecular beam epitaxy. Nanoscale, 2015, 7, 7896-7905.	5.6	122
151	Band alignment at interfaces of few-monolayer MoS2 with SiO2 and HfO2. Microelectronic Engineering, 2015, 147, 294-297.	2.4	31
152	Switching mechanism in two-terminal vanadium dioxide devices. Nanotechnology, 2015, 26, 165202.	2.6	51
153	In situ X-ray diffraction study of the controlled oxidation and reduction in the Vâ€“O system for the synthesis of VO₂ and V₂O₃ thin films. Journal of Materials Chemistry C, 2015, 3, 11357-11365.	5.5	55
154	High Cycling Stability and Extreme Rate Performance in Nanoscaled LiMn₂O₄ Thin Films. ACS Applied Materials & Interfaces, 2015, 7, 22413-22420.	8.0	59
155	Dynamical influence of vortexâ€“antivortex pairs in magnetic vortex oscillators. Journal of Magnetism and Magnetic Materials, 2015, 394, 292-298.	2.3	6
156	Characterization of thin films of the solid electrolyte Li_xMg_{1â^'2x}Al_{2+x}O₄ (x = 0, 0.05, 0.15, 0.25). Physical Chemistry Chemical Physics, 2015, 17, 29045-29056.	2.8	8
157	ALICEâ€”An advanced reflectometer for static and dynamic experiments in magnetism at synchrotron radiation facilities. Review of Scientific Instruments, 2015, 86, 063902.	1.3	26
158	Low temperature deposition of 2D WS₂ layers from WF₆ and H₂S precursors: impact of reducing agents. Chemical Communications, 2015, 51, 15692-15695.	4.1	71
159	Deducing the apparent flat-band position Vafb and the doping level of large area single layer graphene MOS capacitors. Microelectronic Engineering, 2015, 147, 314-317.	2.4	3
160	Ultrafast and Distinct Spin Dynamics in Magnetic Alloys. Spin, 2015, 05, 1550004.	1.3	81
161	Metalâ€Insulator Transition in ALD VO₂ Ultrathin Films and Nanoparticles: Morphological Control. Advanced Functional Materials, 2015, 25, 679-686.	14.9	70
162	Band alignment and effective work function of atomic-layer deposited VO2 and V2 O5 films on SiO2 and Al2 O3. Physica Status Solidi C: Current Topics in Solid State Physics, 2015, 12, 238-241.	0.8	5

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163	Engineering Ultrafast Magnetism. Springer Proceedings in Physics, 2015, , 297-299.	0.2	1
164	System-level assessment and area evaluation of spin wave logic circuits. , 2014, , .		4
165	Bilayer Graphene Tunneling FET for Sub-0.2 V Digital CMOS Logic Applications. IEEE Electron Device Letters, 2014, 35, 1308-1310.	3.9	10
166	Large Area Carbon Nanosheet Capacitors. ECS Solid State Letters, 2014, 3, N8-N10.	1.4	5
167	Low leakage Ru-strontium titanate-Ru metal-insulator-metal capacitors for sub-20â€‰nm technology node in dynamic random access memory. Applied Physics Letters, 2014, 104, .	3.3	32
168	Ultrathin Metal/Amorphous-Silicon/Metal Diode for Bipolar RRAM Selector Applications. IEEE Electron Device Letters, 2014, 35, 199-201.	3.9	39
169	System-level assessment and area evaluation of Spin Wave logic circuits. , 2014, , .		9
170	Crystallization and semiconductor-metal switching behavior of thin VO2 layers grown by atomic layer deposition. Thin Solid Films, 2014, 550, 59-64.	1.8	30
171	Nanoscale spin reversal by non-local angular momentum transfer following ultrafast laser excitation in ferrimagnetic GdFeCo. Nature Materials, 2013, 12, 293-298.	27.5	267
172	(Invited) Vanadium Dioxide for Selector Applications. ECS Transactions, 2013, 58, 249-258.	0.5	16
173	Synthesis of large area carbon nanosheets for energy storage applications. Carbon, 2013, 58, 59-65.	10.3	48
174	Terahertz spin current pulses controlled by magnetic heterostructures. Nature Nanotechnology, 2013, 8, 256-260.	31.5	476
175	Complementary Role of Field and Temperature in Triggering ON/OFF Switching Mechanisms in ${m Hf}/{m HfO}_{2}$ Resistive RAM Cells. IEEE Transactions on Electron Devices, 2013, 60, 2471-2478.	3.0	39
176	Coupling of spin and vibrational degrees of freedom of adsorbates at metal surfaces probed by vibrational sum-frequency generation. Applied Physics Letters, 2013, 103, 132403.	3.3	1
177	VO₂, a Metal-Insulator Transition Material for Nanoelectronic Applications. ECS Transactions, 2012, 45, 151-158.	0.5	7
178	CMOS-Compatible Dielectric Constant Engineering by Embedding Metallic Particles in Aluminum Oxide. ECS Solid State Letters, 2012, 2, N1-N3.	1.4	1
179	The VO2 interface, the metal-insulator transition tunnel junction, and the metal-insulator transition switch On-Off resistance. Journal of Applied Physics, 2012, 112, .	2.5	47
180	Process Study and Characterization of VO₂Thin Films Synthesized by ALD Using TEMAV and O₃Precursors. ECS Journal of Solid State Science and Technology, 2012, 1, P169-P174.	1.8	48

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181	Perpendicular exchange bias in ferrimagnetic spin valves. Nature Communications, 2012, 3, 715.	12.8	112
182	Transient ferromagnetic-like state mediating ultrafast reversal of antiferromagnetically coupled spins. Nature, 2011, 472, 205-208.	27.8	828
183	(Invited) Vanadium Oxide as a Memory Material. ECS Transactions, 2011, 35, 233-243.	0.5	16
184	Laser-induced generation and quenching of magnetization on FeRh studied with time-resolved x-ray magnetic circular dichroism. Physical Review B, 2010, 81, .	3.2	61
185	(Invited) First-Principles Investigation of High-k Dielectrics for Nonvolatile Memories. ECS Transactions, 2010, 33, 393-407.	0.5	3
186	Laser-Induced Magnetization Dynamics of Lanthanide-Doped Permalloy Thin Films. Physical Review Letters, 2009, 102, 117201.	7.8	93
187	Antiferromagnetic-ferromagnetic phase transition in FeRh probed by x-ray magnetic circular dichroism. Physical Review B, 2008, 77, .	3.2	79
188	Electrical Control of Spin Relaxation in a Quantum Dot. Physical Review Letters, 2008, 100, 046803.	7.8	210
189	Quasi-Particle Properties from Tunneling in the v = 5/2 Fractional Quantum Hall State. Science, 2008, 320, 899-902.	12.6	287
190	Ultrafast dynamics at lanthanide surfaces: microscopic interaction of the charge, lattice and spin subsystems. Journal Physics D: Applied Physics, 2008, 41, 164004.	2.8	11
191	Spin-dependent tunneling of single electrons into an empty quantum dot. Physical Review B, 2008, 78, .	3.2	32
192	Energy-Dependent Tunneling in a Quantum Dot. Physical Review Letters, 2007, 98, 036802.	7.8	58
193	Fractional quantum Hall effect in a quantum point contact at filling fraction 5/2. Nature Physics, 2007, 3, 561-565.	16.7	77
194	Toward the manipulation of a single spin in an AlGaAs/GaAs single-electron transistor. , 2006, , .		5
195	Two-stage Kondo effect in a four-electron artificial atom. Physical Review B, 2005, 72, .	3.2	38
196	Magnetic-Field Asymmetry of Nonlinear Transport in Carbon Nanotubes. Physical Review Letters, 2005, 95, 256601.	7.8	60
197	Publisherâ€™s Note: Magnetic-Field Asymmetry of Nonlinear Transport in Carbon Nanotubes [Phys. Rev. Lett.95, 256601 (2005)]. Physical Review Letters, 2005, 95, .	7.8	2
198	Femtosecond Electron and Spin Dynamics in Gd(0001) Studied by Time-Resolved Photoemission and Magneto-optics. Physical Review Letters, 2005, 95, 137402.	7.8	88

#	Article	IF	Citations
199	Oriented growth of single-wall carbon nanotubes using alumina patterns. Nanotechnology, 2004, 15, 473-476.	2.6	14
200	Coherent Optical Phonons and Parametrically Coupled Magnons Induced by Femtosecond Laser Excitation of the Gd(0001) Surface. Physical Review Letters, 2003, 91, 227403.	7.8	99