

Alexei Gruverman

List of Publications by Year in descending order

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260
papers

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9756

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269
times ranked

18355
citing authors

#	ARTICLE	IF	CITATIONS
1	Harnessing Phase Transitions in Antiferroelectric ZrO ₂ Using the Size Effect. <i>Advanced Electronic Materials</i> , 2022, 8, 2100556.	2.6	17
2	Effect of Film Microstructure on Domain Nucleation and Intrinsic Switching in Ferroelectric Y:HfO ₂ Thin Film Capacitors. <i>Advanced Functional Materials</i> , 2022, 32, 2108876.	7.8	23
3	Surface and dynamical properties of Gel ₂ . <i>2D Materials</i> , 2022, 9, 025001.	2.0	7
4	Piezoresponse force microscopy for functional imaging of organic ferroelectrics. , 2022, , 233-262.		2
5	Mechanical Stress Modulation of Resistance in MoS ₂ Junctions. <i>Nano Letters</i> , 2022, 22, 1047-1052.	4.5	14
6	Direct observation of ferroelectricity in two-dimensional MoS ₂ . <i>Npj 2D Materials and Applications</i> , 2022, 6, .	3.9	30
7	Ultrahigh Carrier Mobilities in Ferroelectric Domain Wall Corbino Cones at Room Temperature. <i>Advanced Materials</i> , 2022, 34, .	11.1	10
8	Intrinsic ferroelectricity in Y-doped HfO ₂ thin films. <i>Nature Materials</i> , 2022, 21, 903-909.	13.3	66
9	Metallic surface doping of metal halide perovskites. <i>Nature Communications</i> , 2021, 12, 7.	5.8	66
10	Electroresistance effect in MoS ₂ -Hf _{0.5} Zr _{0.5} O ₂ heterojunctions. <i>Applied Physics Letters</i> , 2021, 118, .	1.5	13
11	Tip-induced domain protrusion in ferroelectric films with in-plane polarization. <i>Journal of Applied Physics</i> , 2021, 129, 054103.	1.1	1
12	Epitaxial Ferroelectric Hf _{0.5} Zr _{0.5} O ₂ with Metallic Pyrochlore Oxide Electrodes. <i>Advanced Materials</i> , 2021, 33, e2006089.	11.1	26
13	Voltage controlled Néel vector rotation in zero magnetic field. <i>Nature Communications</i> , 2021, 12, 1674.	5.8	29
14	Few-layer tin sulfide (SnS): Controlled synthesis, thickness dependent vibrational properties, and ferroelectricity. <i>Nano Today</i> , 2021, 37, 101082.	6.2	34
15	Using Light for Better Programming of Ferroelectric Devices: Optoelectronic MoS ₂ -Pb(Zr,Ti)O ₃ Memories with Improved On/Off Ratios. <i>Advanced Electronic Materials</i> , 2021, 7, 2001223.	2.6	16
16	Perovskite solar cells with embedded homojunction via nonuniform metal ion doping. <i>Cell Reports Physical Science</i> , 2021, 2, 100415.	2.8	10
17	In-plane quasi-single-domain BaTiO ₃ via interfacial symmetry engineering. <i>Nature Communications</i> , 2021, 12, 6784.	5.8	16
18	Piezoelectricity in hafnia. <i>Nature Communications</i> , 2021, 12, 7301.	5.8	37

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19	Artificial Optoelectronic Synapses Based on Ferroelectric Field-Effect Enabled 2D Transition Metal Dichalcogenide Memristive Transistors. ACS Nano, 2020, 14, 746-754.	7.3	190
20	Probing the Dynamics of Topologically Protected Charged Ferroelectric Domain Walls with the Electron Beam at the Atomic Scale. Microscopy and Microanalysis, 2020, 26, 3030-3032.	0.2	3
21	Probing Antiferroelectric/Ferroelectric Phase Transitions in PbZrO ₃ Capacitors by Piezoresponse Force Microscopy. Advanced Functional Materials, 2020, 30, 2003622.	7.8	23
22	Resistive Switching in Individual Co/ZnO Core/Shell Nanoparticles Formed via Inert Gas Condensation and Selective Oxidation. Advanced Electronic Materials, 2020, 6, 2000065.	2.6	4
23	Mechanically induced ferroelectric switching in BaTiO ₃ thin films. Acta Materialia, 2020, 193, 151-162.	3.8	31
24	Ferroelectric Domain Wall Memristor. Advanced Functional Materials, 2020, 30, 2000109.	7.8	86
25	Low-Voltage Domain-Wall LiNbO ₃ Memristors. Nano Letters, 2020, 20, 5873-5878.	4.5	45
26	Observation of Unconventional Dynamics of Domain Walls in Uniaxial Ferroelectric Lead Germanate. Advanced Functional Materials, 2020, 30, 2000284.	7.8	14
27	Electrical and Elastic Properties of Individual Single-Layer Nb ₄ C ₃ T _x MXene Flakes. Advanced Electronic Materials, 2020, 6, 1901382.	2.6	134
28	Atomic-Scale Characterization of Ferro-Electric Domains in Lithium Niobate-revealing the Electronic Properties of Domain Walls. Microscopy and Microanalysis, 2019, 25, 576-577.	0.2	4
29	Characterizing Ferroelectricity with an Atomic Force Microscopy: An All-Around Technique. Nanoscience and Technology, 2019, , 173-203.	1.5	1
30	Intrinsic Conductance of Domain Walls in BiFeO ₃ . Advanced Materials, 2019, 31, e1902099.	11.1	39
31	Electrical Tunability of Domain Wall Conductivity in LiNbO ₃ Thin Films. Advanced Materials, 2019, 31, e1902890.	11.1	61
32	Fluid Imprint and Inertial Switching in Ferroelectric La:HfO ₂ Capacitors. ACS Applied Materials & Interfaces, 2019, 11, 35115-35121.	4.0	58
33	Deterministic Switching of Ferroelectric Bubble Nanodomains. Advanced Functional Materials, 2019, 29, 1808573.	7.8	30
34	Characterization and Modeling of Co/BaTiO ₃ /SrRuO ₃ Ferroelectric Tunnel Junction Memory by Capacitance-Voltage ($C-V$), Current-Voltage ($I-V$), and High-Frequency Measurements. IEEE Transactions on Electron Devices, 2019, 66, 2186-2191.	1.6	4
35	Piezoresponse Force Microscopy (PFM). , 2019, , 291-316.		4
36	Piezoresponse force microscopy and nanoferroic phenomena. Nature Communications, 2019, 10, 1661.	5.8	252

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37	Nanodomain Engineering for Programmable Ferroelectric Devices. Nano Letters, 2019, 19, 3194-3198.	4.5	50
38	Ferroelectricity in $\text{Hf}_{0.5}\text{Zr}_{0.5}\text{O}_2$ Thin Films: A Microscopic Study of the Polarization Switching Phenomenon and Field-Induced Phase Transformations. ACS Applied Materials & Interfaces, 2018, 10, 8818-8826.	4.0	55
39	Molecular doping enabled scalable blading of efficient hole-transport-layer-free perovskite solar cells. Nature Communications, 2018, 9, 1625.	5.8	314
40	Oxygen Stoichiometry Effect on Polar Properties of $\text{LaAlO}_3/\text{SrTiO}_3$. Advanced Functional Materials, 2018, 28, 1707159.	7.8	22
41	Control of Synaptic Plasticity Learning of Ferroelectric Tunnel Memristor by Nanoscale Interface Engineering. ACS Applied Materials & Interfaces, 2018, 10, 12862-12869.	4.0	109
42	Tunneling Hot Spots in Ferroelectric SrTiO_3 . Nano Letters, 2018, 18, 491-497.	4.5	30
43	Colossal X-Ray-Induced Persistent Photoconductivity in Current-Perpendicular-to-Plane Ferroelectric/Semiconductor Junctions. Advanced Functional Materials, 2018, 28, 1704337.	7.8	21
44	Quasi-1D TiS_3 Nanoribbons: Mechanical Exfoliation and Thickness-Dependent Raman Spectroscopy. ACS Nano, 2018, 12, 12713-12720.	7.3	77
45	Large electrostrictive response in lead halide perovskites. Nature Materials, 2018, 17, 1020-1026.	13.3	137
46	Anisotropic polarization-induced conductance at a ferroelectric-insulator interface. Nature Nanotechnology, 2018, 13, 1132-1136.	15.6	53
47	In-Plane Ferroelectricity in Thin Flakes of Van der Waals Hybrid Perovskite. Advanced Materials, 2018, 30, e1803249.	11.1	76
48	Nanosopic studies of domain structure dynamics in ferroelectric La:HfO_2 capacitors. Applied Physics Letters, 2018, 112, .	1.5	85
49	Optical control of polarization in ferroelectric heterostructures. Nature Communications, 2018, 9, 3344.	5.8	119
50	Elastic properties of 2D $\text{Ti}_3\text{C}_2\text{T}_x$ MXene monolayers and bilayers. Science Advances, 2018, 4, eaat0491.	4.7	637
51	Polarization-Mediated Modulation of Electronic and Transport Properties of Hybrid $\text{MoS}_2/\text{BaTiO}_3/\text{SrRuO}_3$ Tunnel Junctions. Nano Letters, 2017, 17, 922-927.	4.5	75
52	High Resolution Piezoresponse Force Microscopy Study of Self-Assembled Peptide Nanotubes. MRS Advances, 2017, 2, 63-69.	0.5	0
53	Effect of Extrinsically Introduced Passive Interface Layer on the Performance of Ferroelectric Tunnel Junctions. ACS Applied Materials & Interfaces, 2017, 9, 5050-5055.	4.0	15
54	Theoretical Approach to Electroresistance in Ferroelectric Tunnel Junctions. Physical Review Applied, 2017, 7, .	1.5	26

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55	CH ₃ NH ₃ Pb ₃ perovskites: Ferroelasticity revealed. Science Advances, 2017, 3, e1602165.	4.7	257
56	Monolithic integration of hybrid perovskite single crystals with heterogenous substrate for highly sensitive X-ray imaging. Nature Photonics, 2017, 11, 315-321.	15.6	580
57	Polarization-Dependent Electronic Transport in Graphene/Pb(Zr,Ti)O ₃ Ferroelectric Field-Effect Transistors. Advanced Electronic Materials, 2017, 3, 1700020.	2.6	60
58	Self-Assembly of Organic Ferroelectrics by Evaporative Dewetting: A Case of β -Glycine. ACS Applied Materials & Interfaces, 2017, 9, 20029-20037.	4.0	23
59	Asymmetry in mechanical polarization switching. Applied Physics Letters, 2017, 110, .	1.5	20
60	Sub-100-nm integrated ferroelectric tunnel junction devices using hydrogen silsesquioxane planarization. Journal of Vacuum Science and Technology B: Nanotechnology and Microelectronics, 2017, 35, .	0.6	4
61	Anomalous photovoltaic effect in organic-inorganic hybrid perovskite solar cells. Science Advances, 2017, 3, e1602164.	4.7	165
62	Integration of perovskite and polymer photoactive layers to produce ultrafast response, ultraviolet-to-near-infrared, sensitive photodetectors. Materials Horizons, 2017, 4, 242-248.	6.4	127
63	Nanoscale Bubble Domains and Topological Transitions in Ultrathin Ferroelectric Films. Advanced Materials, 2017, 29, 1702375.	11.1	110
64	Transient nature of negative capacitance in ferroelectric field-effect transistors. Solid State Communications, 2017, 265, 12-14.	0.9	22
65	On the persistence of polar domains in ultrathin ferroelectric capacitors. Journal of Physics Condensed Matter, 2017, 29, 284001.	0.7	14
66	Superdomain dynamics in ferroelectric-ferroelastic films: Switching, jamming, and relaxation. Applied Physics Reviews, 2017, 4, 041104.	5.5	28
67	Thin Insulating Tunneling Contacts for Efficient and Water-Resistant Perovskite Solar Cells. Advanced Materials, 2016, 28, 6734-6739.	11.1	533
68	Electric-Field-Driven Reversible Conversion Between Methylammonium Lead Triiodide Perovskites and Lead Iodide at Elevated Temperatures. Advanced Energy Materials, 2016, 6, 1501803.	10.2	287
69	Scaling of electroresistance effect in fully integrated ferroelectric tunnel junctions. Applied Physics Letters, 2016, 108, .	1.5	27
70	Room temperature ferroelectricity in continuous croconic acid thin films. Applied Physics Letters, 2016, 109, .	1.5	33
71	Hydrodynamics of domain walls in ferroelectrics and multiferroics: Impact on memory devices. Applied Physics Letters, 2016, 109, .	1.5	8
72	Ferroelectric polymer nanopillar arrays on flexible substrates by reverse nanoimprint lithography. Journal of Materials Chemistry C, 2016, 4, 5914-5921.	2.7	23

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73	Nanodomain Engineering in Ferroelectric Capacitors with Graphene Electrodes. Nano Letters, 2016, 16, 6460-6466.	4.5	41
74	Fabrication of diisopropylammonium bromide aligned microcrystals with in-plane uniaxial polarization. Journal Physics D: Applied Physics, 2016, 49, 505305.	1.3	7
75	Efficient Semitransparent Perovskite Solar Cells for 23.0% Efficiency Perovskite/Silicon Four-Terminal Tandem Cells. Advanced Energy Materials, 2016, 6, 1601128.	10.2	240
76	Is Cu a stable electrode material in hybrid perovskite solar cells for a 30-year lifetime?. Energy and Environmental Science, 2016, 9, 3650-3656.	15.6	239
77	Tailoring Self-Polarization of BaTiO ₃ Thin Films by Interface Engineering and Flexoelectric Effect. Advanced Materials Interfaces, 2016, 3, 1600737.	1.9	37
78	Domain switching kinetics in vinylidene fluoride/tetrafluoroethylene copolymer thin films. Japanese Journal of Applied Physics, 2016, 55, 10TA12.	0.8	3
79	Fabrication of ferroelectric polymer nanostructures on flexible substrates by soft-mold reverse nanoimprint lithography. Nanotechnology, 2016, 27, 015302.	1.3	24
80	Grain boundary dominated ion migration in polycrystalline organic-inorganic halide perovskite films. Energy and Environmental Science, 2016, 9, 1752-1759.	15.6	917
81	Domain wall conductivity in semiconducting hexagonal ferroelectric TbMnO ₃ thin films. Nanotechnology, 2016, 27, 155705.	1.3	16
82	Ultrathin Hf _{0.5} Zr _{0.5} O ₂ Ferroelectric Films on Si. ACS Applied Materials & Interfaces, 2016, 8, 7232-7237.	4.0	186
83	Imprint Control of BaTiO ₃ Thin Films via Chemically Induced Surface Polarization Pinning. Nano Letters, 2016, 16, 2400-2406.	4.5	56
84	(Invited) Emerging Ferroelectric Devices. ECS Meeting Abstracts, 2016, , .	0.0	0
85	Nanomechanics of flexoelectric switching. Physical Review B, 2015, 92, .	1.1	56
86	Contact resistance to SrRuO ₃ and La _{0.67} Sr _{0.33} MnO ₃ epitaxial films. Applied Physics Letters, 2015, 107, .	1.5	11
87	Electromechanics of Ferroelectric-Like Behavior of LaAlO ₃ Thin Films. Advanced Functional Materials, 2015, 25, 6538-6544.	7.8	42
88	Statics and Dynamics of Ferroelectric Domains in Diisopropylammonium Bromide. Advanced Materials, 2015, 27, 7832-7838.	11.1	60
89	Multiferroic tunnel junctions and ferroelectric control of magnetic state at interface (invited). Journal of Applied Physics, 2015, 117, .	1.1	26
90	Contribution of oxygen vacancies to the ferroelectric behavior of Hf _{0.5} Zr _{0.5} O ₂ thin films. Applied Physics Letters, 2015, 106, .	1.5	65

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91	CMOS compatible integrated ferroelectric tunnel junctions (FTJ)., 2015, , .		4
92	ELASTICITY OF DIFFERENTIATED AND UNDIFFERENTIATED HUMAN NEUROBLASTOMA CELLS CHARACTERIZED BY ATOMIC FORCE MICROSCOPY. Journal of Mechanics in Medicine and Biology, 2015, 15, 1550069.	0.3	10
93	Enhancement of Local Piezoresponse in Polymer Ferroelectrics <i>via</i> Nanoscale Control of Microstructure. ACS Nano, 2015, 9, 1809-1819.	7.3	65
94	Negative capacitance detected. Nature Materials, 2015, 14, 137-139.	13.3	93
95	Optoelectrical Molybdenum Disulfide (MoS ₂)â€”Ferroelectric Memories. ACS Nano, 2015, 9, 8089-8098.	7.3	193
96	Effect of epitaxial strain on tunneling electroresistance in ferroelectric tunnel junctions. Nanotechnology, 2015, 26, 305202.	1.3	19
97	Toward Ferroelectric Control of Monolayer MoS ₂ . Nano Letters, 2015, 15, 3364-3369.	4.5	62
98	Mechanical Tuning of LaAlO ₃ /SrTiO ₃ Interface Conductivity. Nano Letters, 2015, 15, 3547-3551.	4.5	75
99	Nitrogen-Doping Induced Self-Assembly of Graphene Nanoribbon-Based Two-Dimensional and Three-Dimensional Metamaterials. Nano Letters, 2015, 15, 5770-5777.	4.5	80
100	Emergence of room-temperature ferroelectricity at reduced dimensions. Science, 2015, 349, 1314-1317.	6.0	259
101	Giant switchable photovoltaic effect in organometal trihalide perovskite devices. Nature Materials, 2015, 14, 193-198.	13.3	1,372
102	Ferroelectric Domain Wall Injection. Advanced Materials, 2014, 26, 293-298.	11.1	72
103	Sequential injection of domain walls into ferroelectrics at different bias voltages: Paving the way for â€œdomain wall memristorsâ€. Journal of Applied Physics, 2014, 116, .	1.1	20
104	High-Symmetry Polarization Domains in Low-Symmetry Ferroelectrics. Nano Letters, 2014, 14, 6931-6935.	4.5	24
105	Polarization imaging in ferroelectric polymer thin film capacitors by pyroelectric scanning microscopy. Applied Physics Letters, 2014, 104, 192901.	1.5	13
106	Ferroelectric tunnel junctions with graphene electrodes. Nature Communications, 2014, 5, 5518.	5.8	107
107	Roomâ€”temperature Ferroelectricity in Hexagonal TbMnO ₃ Thin Films. Advanced Materials, 2014, 26, 7660-7665.	11.1	32
108	Changing molecular band offsets in polymer blends of (P3HT/P(VDFâ€”TrFE)) poly(3-hexylthiophene) and poly(vinylidene fluoride with trifluoroethylene) due to ferroelectric poling. RSC Advances, 2014, 4, 3020-3027.	1.7	9

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109	Sub-critical field domain reversal in epitaxial ferroelectric films. Journal of Applied Physics, 2014, 116, .	1.1	8
110	Ferroelectric switching in epitaxial GeTe films. APL Materials, 2014, 2, .	2.2	67
111	Coplanar switching of polarization in thin films of vinylidene fluoride oligomers. Applied Physics Letters, 2014, 105, 182903.	1.5	4
112	Investigation of ferroelectric domains in thin films of vinylidene fluoride oligomers. Applied Physics Letters, 2014, 105, .	1.5	10
113	Scaling Behavior of Resistive Switching in Epitaxial Bismuth Ferrite Heterostructures. Advanced Functional Materials, 2014, 24, 3962-3969.	7.8	68
114	Effect of lanthanum doping on tetragonal-like BiFeO_3 with mixed-phase domain structures. Physical Review B, 2014, 90, .	1.1	28
115	Exploring Vertex Interactions in Ferroelectric Flux-Closure Domains. Nano Letters, 2014, 14, 4230-4237.	4.5	38
116	Domain Walls: Ferroelectric Domain Wall Injection (Adv. Mater. 2/2014). Advanced Materials, 2014, 26, 348-348.	11.1	0
117	Effect of disorder potential on domain switching behavior in polymer ferroelectric films. Nanotechnology, 2013, 24, 015706.	1.3	24
118	Synthesis and Application of Ferroelectric P(VDF-TrFE) Nanoparticles in Organic Photovoltaic Devices for High Efficiency. Advanced Energy Materials, 2013, 3, 1581-1588.	10.2	50
119	Retention of resistance states in ferroelectric tunnel memristors. Applied Physics Letters, 2013, 103, .	1.5	26
120	Nanoscale Dynamics of Superdomain Boundaries in Single-Crystal BaTiO_3 Lamellae. Advanced Materials, 2013, 25, 1323-1330.	11.1	38
121	Adherent cells avoid polarization gradients on periodically poled LiTaO_3 ferroelectrics. Biointerphases, 2013, 8, 27.	0.6	13
122	Enhanced tunnelling electroresistance effect due to a ferroelectrically induced phase transition at a magnetic complex oxide interface. Nature Materials, 2013, 12, 397-402.	13.3	283
123	Polarization relaxation kinetics in ultrathin ferroelectric capacitors. Applied Physics Letters, 2013, 102, .	1.5	23
124	Magnetolectric coupling at the $\text{EuO}/\text{BaTiO}_3$ interface. Applied Physics Letters, 2013, 102, .	1.5	14
125	Beyond the barrier. Nature Materials, 2013, 12, 602-604.	13.3	106
126	Ferroelectric Materials: Synthesis and Application of Ferroelectric P(VDF-TrFE) Nanoparticles in Organic Photovoltaic Devices for High Efficiency (Adv. Energy Mater. 12/2013). Advanced Energy Materials, 2013, 3, 1672-1672.	10.2	2

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127	Interface control of surface photochemical reactivity in ultrathin epitaxial ferroelectric films. Applied Physics Letters, 2013, 102, .	1.5	31
128	Epitaxial $\text{Pb}_x\text{Zr}_{1-x}\text{TiO}_3$ on GaN. Journal of Applied Physics, 2013, 113, 074107.	1.1	8
129	Domain wall propagation in meso- and nanoscale ferroelectrics. Journal of Physics Condensed Matter, 2012, 24, 024204.	0.7	13
130	Tunnel electroresistance in junctions with ultrathin ferroelectric $\text{Pb}(\text{Zr}_{0.2}\text{Ti}_{0.8})\text{O}_3$ barriers. Applied Physics Letters, 2012, 100, .	1.5	96
131	Stability of electrically induced-polarization in poly (L-lactic) acid for bone regeneration. Applied Physics Letters, 2012, 101, 023701.	1.5	14
132	Advanced modes of piezoresponse force microscopy for ferroelectric nanostructures. , 2012, , 157-180.		0
133	Understanding the effect of ferroelectric polarization on power conversion efficiency of organic photovoltaic devices. Energy and Environmental Science, 2012, 5, 8558.	15.6	64
134	Ferroelectric Tunnel Memristor. Nano Letters, 2012, 12, 5697-5702.	4.5	285
135	Mechanically-Induced Resistive Switching in Ferroelectric Tunnel Junctions. Nano Letters, 2012, 12, 6289-6292.	4.5	58
136	Mechanical Writing of Ferroelectric Polarization. Science, 2012, 336, 59-61.	6.0	645
137	Switchable Induced Polarization in $\text{LaAlO}_3/\text{SrTiO}_3$ Heterostructures. Nano Letters, 2012, 12, 1765-1771.	4.5	167
138	Complex domain structure in relaxed PbTiO_3 thick films grown on $(100)\text{cSrRuO}_3/(100)\text{SrTiO}_3$ substrates. Journal of Applied Physics, 2012, 112, .	1.1	15
139	Recent Advances in Functional Testing of Ferroelectric Nanostructures. Ferroelectrics, 2012, 433, 88-106.	0.3	6
140	Suitability of PLLA as Piezoelectric Substrates for Tissue Engineering Evidenced by Microscopy Techniques. Microscopy and Microanalysis, 2012, 18, 63-64.	0.2	13
141	Ferroelectric and multiferroic tunnel junctions. MRS Bulletin, 2012, 37, 138-143.	1.7	182
142	Electric modulation of magnetization at the $\text{BaTiO}_3/\text{La}_{0.67}\text{Sr}_{0.33}\text{MnO}_3$ interfaces. Applied Physics Letters, 2012, 100, .	1.5	118
143	Ferroelectric carbon nanotube memory devices. Nanotechnology, 2012, 23, 165702.	1.3	19
144	Enhancement of Ferroelectric Polarization Stability by Interface Engineering. Advanced Materials, 2012, 24, 1209-1216.	11.1	118

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145	Tuning the Energy Level Offset between Donor and Acceptor with Ferroelectric Dipole Layers for Increased Efficiency in Bilayer Organic Photovoltaic Cells. <i>Advanced Materials</i> , 2012, 24, 1455-1460.	11.1	127
146	Polarization Mediated Chemistry on Ferroelectric Polymer Surfaces. <i>Journal of Physical Chemistry C</i> , 2011, 115, 13041-13046.	1.5	19
147	High-Resolution Studies of Domain Switching Behavior in Nanostructured Ferroelectric Polymers. <i>Nano Letters</i> , 2011, 11, 1970-1975.	4.5	112
148	Protein adsorption on piezoelectric poly(L-lactic) acid thin films by scanning probe microscopy. <i>Applied Physics Letters</i> , 2011, 98, .	1.5	23
149	Mesoscale flux-closure domain formation in single-crystal BaTiO ₃ . <i>Nature Communications</i> , 2011, 2, 404.	5.8	153
150	Efficiency enhancement in organic solar cells with ferroelectric polymers. <i>Nature Materials</i> , 2011, 10, 296-302.	13.3	482
151	Direct Fabrication of Arbitrary-Shaped Ferroelectric Nanostructures on Plastic, Glass, and Silicon Substrates. <i>Advanced Materials</i> , 2011, 23, 3786-3790.	11.1	31
152	Nanomanufacturing: Direct Fabrication of Arbitrary-Shaped Ferroelectric Nanostructures on Plastic, Glass, and Silicon Substrates (<i>Adv. Mater.</i> 33/2011). <i>Advanced Materials</i> , 2011, 23, 3740-3740.	11.1	13
153	Ultrathin BaTiO ₃ templates for multiferroic nanostructures. <i>New Journal of Physics</i> , 2011, 13, 083037.	1.2	13
154	Orientalional imaging in polar polymers by piezoresponse force microscopy. <i>Journal of Applied Physics</i> , 2011, 110, .	1.1	55
155	Composition dependence of crystal structure and electrical properties for epitaxial films of Bi(Zn _{1/2} Ti _{1/2})O ₃ -BiFeO ₃ solid solution system. <i>Journal of the Ceramic Society of Japan</i> , 2010, 118, 659-663.	0.5	10
156	Preparation and Characterization of Periodically Poled Ferroelectric Lithium Niobate (LiNbO ₃). <i>Materials Research Society Symposia Proceedings</i> , 2010, 1255, 205.	0.1	0
157	Anisotropy of domain growth in epitaxial ferroelectric capacitors. <i>Applied Physics Letters</i> , 2010, 96, 112903.	1.5	16
158	Polarization-specific adsorption of organic molecules on ferroelectric LiNbO ₃ surfaces. <i>Applied Physics Letters</i> , 2010, 97, 243702.	1.5	43
159	Web-like domain structure formation in barium titanate single crystals. <i>Applied Physics Letters</i> , 2010, 97, 042902.	1.5	6
160	The interface bonding and orientation of a quinonoid zwitterion. <i>Physical Chemistry Chemical Physics</i> , 2010, 12, 10329.	1.3	30
161	Polarization Behavior in Thin Film Ferroelectric Capacitors at the Nanoscale. , 2010, , 529-540.		2
162	Two-Dimensional Nanoscale Structural and Functional Imaging in Individual Collagen Type I Fibrils. <i>Biophysical Journal</i> , 2010, 98, 3070-3077.	0.2	60

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163	Piezoresponse Force Microscopy: A Window into Electromechanical Behavior at the Nanoscale. MRS Bulletin, 2009, 34, 648-657.	1.7	186
164	Spatial variations in local switching parameters of ferroelectric random access memory capacitors. Applied Physics Letters, 2009, 95, 092901.	1.5	13
165	Nanoscale domain patterns in ultrathin polymer ferroelectric films. Journal of Physics Condensed Matter, 2009, 21, 485902.	0.7	35
166	Nanoscale insight into the statics and dynamics of polarization behavior in thin film ferroelectric capacitors. Journal of Materials Science, 2009, 44, 5182-5188.	1.7	19
167	Start the presses. Nature Materials, 2009, 8, 9-10.	13.3	51
168	Tunneling Electroresistance Effect in Ferroelectric Tunnel Junctions at the Nanoscale. Nano Letters, 2009, 9, 3539-3543.	4.5	536
169	Piezoresponse Force Microscopy Studies of Switching Behavior of Ferroelectric Capacitors on a 100-ns Time Scale. Physical Review Letters, 2008, 100, 097601.	2.9	179
170	Abnormal domain switching in Pb(Zr,Ti)O ₃ thin film capacitors. Applied Physics Letters, 2008, 93, .	1.5	36
171	Introduction to the special issue on the applications of ferroelectrics: Part II. IEEE Transactions on Ultrasonics, Ferroelectrics, and Frequency Control, 2008, 55, 938-941.	1.7	0
172	Physical adsorption on ferroelectric surfaces: photoinduced and thermal effects. Nanotechnology, 2008, 19, 495303.	1.3	52
173	Nanodomain faceting in ferroelectrics. Journal of Physics Condensed Matter, 2008, 20, 425222.	0.7	24
174	Vortex ferroelectric domains. Journal of Physics Condensed Matter, 2008, 20, 342201.	0.7	155
175	Experimental evidence of strain relaxed domain structure in (100)/(001)-oriented epitaxial lead titanate thick films grown by metal organic chemical vapor deposition. Journal of Applied Physics, 2008, 104, 064121.	1.1	20
176	Peculiar effect of mechanical stress on polarization stability in micrometer-scale ferroelectric capacitors. Applied Physics Letters, 2008, 93, .	1.5	25
177	Imaging mechanism of piezoresponse force microscopy in capacitor structures. Applied Physics Letters, 2008, 92, .	1.5	56
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