Richard Beanland

List of Publications by Year
in descending order

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195 papers	5,762 citations	101543 36 h-index	88630 70 g-index
205 all docs	205 docs citations	205 times ranked	8702 citing authors

#	Article	IF	Citations
1	Lateral heterojunctions within monolayer MoSe2â€“WSe2 semiconductors. Nature Materials, 2014, 13, 1096-1101.	27.5	872
2	Graphene Oxide: Structural Analysis and Application as a Highly Transparent Support for Electron Microscopy. ACS Nano, 2009, 3, 2547-2556.	14.6	629
3	Novel Zn-based alloys for biodegradable stent applications: Design, development and in vitro degradation. Journal of the Mechanical Behavior of Biomedical Materials, 2016, 60, 581-602.	3.1	316
4	Improved performance of 1.3Î¼m multilayer InAs quantum-dot lasers using a high-growth-temperature GaAs spacer layer. Applied Physics Letters, 2004, 85, 704-706.	3.3	267
5	Fabrication, mechanical properties and in vitro degradation behavior of newly developed Zn Ag alloys for degradable implant applications. Materials Science and Engineering C, 2017, 77, 1170-1181.	7.3	197
6	Plastic relaxation and relaxed buffer layers for semiconductor epitaxy. Advances in Physics, 1996, 45, 87-146.	14.4	185
7	Multiplication of misfit dislocations in epitaxial layers. Journal of Applied Physics, 1992, 72, 4031-4035.	2.5	95
8	Influences of the spacer layer growth temperature on multilayer InAsâ•GaAs quantum dot structures. Journal of Applied Physics, 2004, 96, 1988-1992.	2.5	85
9	Retarding oxidation of copper nanoparticles without electrical isolation and the size dependence of work function. Nature Communications, 2017, 8, 1894.	12.8	78
10	Tracking Metal Electrodeposition Dynamics from Nucleation and Growth of a Single Atom to a Crystalline Nanoparticle. ACS Nano, 2018, 12, 7388-7396.	14.6	74
11	Preparation of a hybrid Cu₂O/CuMoO₄ nanosheet electrode for high-performance asymmetric supercapacitors. Journal of Materials Chemistry A, 2016, 4, 17749-17756.	10.3	71
12	Optimizations of Defect Filter Layers for 1.3-Î¼m InAs/GaAs Quantum-Dot Lasers Monolithically Grown on Si Substrates. IEEE Journal of Selected Topics in Quantum Electronics, 2016, 22, 50-56.	2.9	69
13	Microstructural characterization of solâ€“gel leadâ€“zirconateâ€“titanate thin films. Journal of Applied Physics, 1998, 83, 2202-2208.	2.5	65
14	Structural analysis of strained quantum dots using nuclear magnetic resonance. Nature Nanotechnology, 2012, 7, 646-650.	31.5	65
15	Artefacts in geometric phase analysis of compound materials. Ultramicroscopy, 2015, 157, 91-97.	1.9	64
16	Lithium ion batteries (NMC/graphite) cycling at 80ÂÂ°C: Different electrolytes and related degradation mechanism. Journal of Power Sources, 2018, 373, 172-183.	7.8	59
17	Wafer-Scale Fabrication of Self-Catalyzed 1.7 eV GaAsP Coreâ€“Shell Nanowire Photocathode on Silicon Substrates. Nano Letters, 2014, 14, 2013-2018.	9.1	58
18	Polarization curling and flux closures in multiferroic tunnel junctions. Nature Communications, 2016, 7, 13484.	12.8	58

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19	Dislocation multiplication mechanisms in lowâ€misfit strained epitaxial layers. Journal of Applied Physics, 1995, 77, 6217-6222.	2.5	56
20	Design rules for dislocation filters. Journal of Applied Physics, 2014, 116, .	2.5	55
21	Mid-Infrared InAs/InAsSb Superlattice nBn Photodetector Monolithically Integrated onto Silicon. ACS Photonics, 2019, 6, 538-544.	6.6	53
22	A study of surface cross-hatch and misfit dislocation structure in grown by chemical beam epitaxy. Journal of Crystal Growth, 1995, 149, 1-11.	1.5	52
23	Symmetry and defects in monoclinic Na<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:msub><mml:mi mathvariant="normal">Na</mml:mi><mml:mrow><mml:mn>0.5</mml:mn></mml:mrow></mml:msub></mml:math><mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:msub><mml:mi mathvariant="normal">Bi</mml:mi><mml:mrow><mml:mn>0.5</mml:mn></mml:mrow></mml:msub></mml:math><mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:msub><mml:mi mathvariant="normal">TiO</mml:mi>	3.2	51
24	Cubic MnSb: Epitaxial growth of a predicted room temperature half-metal. Physical Review B, 2012, 85, .	3.2	50
25	On the structure and topography of free-standing chemically modified graphene. New Journal of Physics, 2010, 12, 125010.	2.9	49
26	Chemotaxis of catalytic silicaâ€“manganese oxide â€œmatchstickâ€•particles. Materials Horizons, 2014, 1, 65-68.	12.2	49
27	Microstructure and Solidification Sequence of the Interdendritic Region in a Third Generation Single-Crystal Nickel-Base Superalloy. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2009, 40, 1660-1669.	2.2	48
28	Imaging planar tetragonal sheets in rhombohedral Na0.5Bi0.5TiO3 using transmission electron microscopy. Scripta Materialia, 2011, 65, 440-443.	5.2	46
29	Origin of Defect Tolerance in InAs/GaAs Quantum Dot Lasers Grown on Silicon. Journal of Lightwave Technology, 2020, 38, 240-248.	4.6	46
30	Structural analysis of life tested 1.3â€‚Î¼m quantum dot lasers. Journal of Applied Physics, 2008, 103, .	2.5	45
31	Dark field transmission electron microscope images of IIIâ€“V quantum dot structures. Ultramicroscopy, 2005, 102, 115-125.	1.9	43
32	Submonolayer InGaAs/GaAs quantum dot solar cells. Solar Energy Materials and Solar Cells, 2014, 126, 83-87.	6.2	43
33	Managing dose-, damage- and data-rates in multi-frame spectrum-imaging. Microscopy (Oxford,) Tj ETQq1 1 0.784314 rgBT /Overlock 1	1.5	42
34	Dislocation filters in GaAs on Si. Semiconductor Science and Technology, 2015, 30, 114004.	2.0	40
35	Ordered mesoporous silica films with pores oriented perpendicular to a titanium nitride substrate. Physical Chemistry Chemical Physics, 2015, 17, 4763-4770.	2.8	39
36	Polarity-Driven Quasi-3-Fold Composition Symmetry of Self-Catalyzed IIIâ€“Vâ€“V Ternary Coreâ€“Shell Nanowires. Nano Letters, 2015, 15, 3128-3133.	9.1	39

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37	Partial Scanning Transmission Electron Microscopy with Deep Learning. Scientific Reports, 2020, 10, 8332.	3.3	35
38	An approach to the systematic distortion correction in aberration-corrected HAADF images. Journal of Microscopy, 2006, 221, 1-7.	1.8	34
39	IIIâ€“V quantum light source and cavity-QED on Silicon. Scientific Reports, 2013, 3, 1239.	3.3	33
40	Assessment of acid and thermal oxidation treatments for removing sp2 bonded carbon from the surface of boron doped diamond. Carbon, 2020, 167, 1-10.	10.3	32
41	Relaxation of InGaAs layers grown on (111)B GaAs. Applied Physics Letters, 1994, 65, 3212-3214.	3.3	31
42	Fabrication of crystals from single metal atoms. Nature Communications, 2014, 5, 3851.	12.8	31
43	Compliance-Free ZrO2/ZrO2â€‰â€²â€‰x /ZrO2 Resistive Memory with Controllable Interfacial Multistate Switching Behaviour. Nanoscale Research Letters, 2017, 12, 384.	5.7	31
44	O-band InAs/GaAs quantum dot laser monolithically integrated on exact (0â€¯0â€¯1) Si substrate. Journal of Crystal Growth, 2019, 511, 56-60.	1.5	31
45	Resolving the Nanoscale Morphology and Crystallographic Structure of Molecular Thin Films: F₁₆CuPc on Graphene Oxide. Chemistry of Materials, 2012, 24, 1365-1370.	6.7	30
46	Ferroelectric incommensurate spin crystals. Nature, 2022, 602, 240-244.	27.8	30
47	Material optimisation for AlGaN/GaN HFET applications. Journal of Crystal Growth, 2001, 230, 573-578.	1.5	29
48	Structure of planar defects in tilted perovskites. Acta Crystallographica Section A: Foundations and Advances, 2011, 67, 191-199.	0.3	29
49	Electron-beam-induced ferroelectric domain behavior in the transmission electron microscope: Toward deterministic domain patterning. Physical Review B, 2016, 94, .	3.2	26
50	In situ annealing enhancement of the optical properties and laser device performance of InAs quantum dots grown on Si substrates. Optics Express, 2016, 24, 6196.	3.4	26
51	xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:mrow><mml:mi mathvariant="normal">Y</mml:mi><mml:msub><mml:mi mathvariant="normal">b</mml:mi><mml:mn>2</mml:mn></mml:msub><mml:mi mathvariant="normal">T</mml:mi><mml:msub><mml:mi mathvariant="normal">I</mml:mi><mml:mn>2</mml:mn></mml:msub><mml:mi mathvariant	3.2	26
52	The Germanate Anomaly in Alkaline Earth Germanate Glasses. Journal of Physical Chemistry C, 2017, 121, 9462-9479.	3.1	26
53	Photoluminescence characterization of defects in Si and SiGe structures. Journal of Physics Condensed Matter, 2000, 12, 10105-10121.	1.8	24
54	Improving electron micrograph signal-to-noise with an atrous convolutional encoder-decoder. Ultramicroscopy, 2019, 202, 18-25.	1.9	23

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55	All-MBE grown InAs/GaAs quantum dot lasers with thin Ge buffer layer on Si substrates. Journal Physics D: Applied Physics, 2021, 54, 035103.	2.8	23
56	Quantitative Strain Mapping Applied to Aberration-Corrected HAADF Images. Microscopy and Microanalysis, 2006, 12, 285-294.	0.4	22
57	MBE grown GaAsBi/GaAs multiple quantum well structures: Structural and optical characterization. Journal of Crystal Growth, 2015, 425, 237-240.	1.5	22
58	Inversion Boundary Annihilation in GaAs Monolithically Grown on Onâ€Axis Silicon (001). Advanced Optical Materials, 2020, 8, 2000970.	7.3	22
59	Mapping quantum dot-in-well structures on the nanoscale using the plasmon peak in electron energy loss spectra. Physical Review B, 2005, 72, .	3.2	21
60	Mechanism for improvements of optical properties of 1.3-Î¼m InAsâ•GaAs quantum dots by a combined InAlAsâ€“InGaAs cap layer. Journal of Applied Physics, 2005, 98, 083516.	2.5	21
61	Exploration of the Smallest Diameter Tin Nanowires Achievable with Electrodeposition: Sub 7 nm Sn Nanowires Produced by Electrodeposition from a Supercritical Fluid. Nano Letters, 2018, 18, 941-947.	9.1	21
62	Atomic structure and interface chemistry in a high-stiffness and high-strength Alâ€“Siâ€“Mg/TiB2 nanocomposite. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2019, 763, 138072.	5.6	21
63	Large-Area Electrodeposition of Few-Layer MoS‹sub›2‹/sub› on Graphene for 2D Material Heterostructures. ACS Applied Materials & Interfaces, 2020, 12, 49786-49794.	8.0	21
64	Multiple Hydrogen-Bond Array Reinforced Cellular Polymer Films from Colloidal Crystalline Assemblies of Soft Latex Particles. ACS Macro Letters, 2012, 1, 603-608.	4.8	20
65	Mechanistic Insight into the Synthesis of Silica-Based â€œMatchstickâ€•Colloids. Langmuir, 2015, 31, 9017-9025.	3.5	20
66	Predictability of plastic relaxation in metamorphicepitaxy. Materials Science and Technology, 1996, 12, 181-186.	1.6	19
67	The Electrodeposition of Silver from Supercritical Carbon Dioxide/Acetonitrile. ChemElectroChem, 2014, 1, 187-194.	3.4	19
68	Low bandgap GaInAsSb thermophotovoltaic cells on GaAs substrate with advanced metamorphic buffer layer. Solar Energy Materials and Solar Cells, 2019, 191, 406-412.	6.2	19
69	InSb quantum dots for the mid-infrared spectral range grown on GaAs substrates using metamorphic InAs buffer layers. Semiconductor Science and Technology, 2014, 29, 075011.	2.0	18
70	Accuracy of composition measurement using X-ray spectroscopy in precipitate-strengthened alloys: Application to Ni-base superalloys. Acta Materialia, 2011, 59, 1003-1013.	7.9	17
71	Digital electron diffraction â€“ seeing the whole picture. Acta Crystallographica Section A: Foundations and Advances, 2013, 69, 427-434.	0.3	17
72	Nonradiative Step Facets in Semiconductor Nanowires. Nano Letters, 2017, 17, 2454-2459.	9.1	17

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73	Thin Ge buffer layer on silicon for integration of III-V on silicon. Journal of Crystal Growth, 2019, 514, 109-113.	1.5	17
74	Adaptive learning rate clipping stabilizes learning. Machine Learning: Science and Technology, 2020, 1, 015011.	5.0	17
75	Mapping the effective mass of electrons in III-V semiconductor quantum confined structures. Physical Review B, 2006, 73, .	3.2	16
76	Correlation between defect density and current leakage in InAsâˆ•GaAs quantum dot-in-well structures. Journal of Applied Physics, 2009, 106, .	2.5	16
77	Blocking of indium incorporation by antimony in IIIâ€“V-Sb nanostructures. Nanotechnology, 2010, 21, 145606.	2.6	16
78	InAsP quantum dot lasers grown by MOVPE. Optics Express, 2015, 23, 27282.	3.4	16
79	Stable Defects in Semiconductor Nanowires. Nano Letters, 2018, 18, 3081-3087.	9.1	16
80	Atomic level termination for passivation and functionalisation of silicon surfaces. Nanoscale, 2020, 12, 17332-17341.	5.6	16
81	Backâ€Endâ€ofâ€Line SiCâ€Based Memristor for Resistive Memory and Artificial Synapse. Advanced Electronic Materials, 2022, 8, .	5.1	16
82	On determining accurate positions, separations, and internal profiles for delta layers. Applied Surface Science, 2003, 203-204, 273-276.	6.1	15
83	Anisotropy in the hole mobility measured along the [110] and [1Â¯10] orientations in a strained Ge quantum well. Applied Physics Letters, 2014, 104, .	3.3	15
84	Self-Formed Quantum Wires and Dots in GaAsPâ€“GaAsP Coreâ€“Shell Nanowires. Nano Letters, 2019, 19, 4158-4165.	9.1	15
85	Mid-infrared type-II InAs/InAsSb quantum wells integrated on silicon. Applied Physics Letters, 2020, 117, .	3.3	15
86	Optical evaluation of an AlAs/AlGaAs visible Bragg reflector grown by chemical beam epitaxy. Applied Physics Letters, 1992, 61, 2770-2772.	3.3	14
87	Growth and structural characterization of GaAsBi/GaAs multiple quantum wells. Semiconductor Science and Technology, 2015, 30, 094013.	2.0	14
88	Osmium Atoms and Os₂ Molecules Move Faster on Selenium-Doped Compared to Sulfur-Doped Boronic Graphenic Surfaces. Chemistry of Materials, 2015, 27, 5100-5105.	6.7	14
89	Towards a 3D GeSbTe phase change memory with integrated selector by non-aqueous electrodeposition. Faraday Discussions, 2019, 213, 339-355.	3.2	14
90	X-ray measurement of deformation and dislocation density in semiconductor strained layers. Journal of Crystal Growth, 1993, 130, 394-404.	1.5	13

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91	The effect of strained confinement layers in InP self-assembled quantum dot material. Semiconductor Science and Technology, 2012, 27, 094008.	2.0	13
92	Effect of annealing in the Sb and In distribution of type II GaAsSb-capped InAs quantum dots. Semiconductor Science and Technology, 2015, 30, 114006.	2.0	12
93	Quantitative Highâ€Dynamicâ€Range Electron Diffraction of Polar Nanodomains in Pb₂ScTaO₆. Advanced Materials, 2019, 31, e1806498.	21.0	12
94	Phase-Change Memory by GeSbTe Electrodeposition in Crossbar Arrays. ACS Applied Electronic Materials, 2021, 3, 3610-3618.	4.3	12
95	On the development of misfit dislocation distributions in strained epitaxial layer interfaces. Scripta Metallurgica Et Materialia, 1995, 33, 123-128.	1.0	11
96	Low voltage STEM imaging of multi-walled carbon nanotubes. Micron, 2012, 43, 428-434.	2.2	11
97	Ultra high hole mobilities in a pure strained Ge quantum well. Thin Solid Films, 2014, 557, 329-333.	1.8	11
98	Electron-irradiation induced defects in Yb2Ti2.05O7. Acta Materialia, 2018, 143, 291-297.	7.9	11
99	Electrodeposition of tin nanowires from a dichloromethane based electrolyte. RSC Advances, 2018, 8, 24013-24020.	3.6	11
100	A model for the distribution of misfit dislocations near epitaxial layer interfaces. Philosophical Magazine A: Physics of Condensed Matter, Structure, Defects and Mechanical Properties, 1995, 72, 1531-1545.	0.6	10
101	An in-situ laser-light scattering study of the development of surface topography during GaAs and InxGa1 â^' xAs chemical beam epitaxy. Journal of Crystal Growth, 1996, 164, 51-57.	1.5	10
102	Strain interactions and defect formation in stacked InGaAs quantum dot and dot-in-well structures. Physica E: Low-Dimensional Systems and Nanostructures, 2005, 26, 245-251.	2.7	10
103	Optimizing the growth of 1.3-Î¼m InAs/InGaAs dots-in-a-well structure: Achievement of high-performance laser. Materials Science and Engineering C, 2005, 25, 779-783.	7.3	10
104	Silicon-Based Single Quantum Dot Emission in the Telecoms C-Band. ACS Photonics, 2017, 4, 1740-1746.	6.6	10
105	Quantum dots in strained layersâ€"preventing relaxation through the precipitate hardening effect. Journal of Applied Physics, 2008, 104, .	2.5	9
106	Electrodeposition of Protocrystalline Germanium from Supercritical Difluoromethane. ChemElectroChem, 2016, 3, 726-733.	3.4	9
107	Controlling palladium morphology in electrodeposition from nanoparticles to dendritesviathe use of mixed solvents. Nanoscale, 2020, 12, 21757-21769.	5.6	9
108	Electrodeposition of GeSbTe-Based Resistive Switching Memory in Crossbar Arrays. Journal of Physical Chemistry C, 2021, 125, 26247-26255.	3.1	9

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109	AgNb7O18: An Ergodic Relaxor Ferroelectric. Inorganic Chemistry, 2014, 53, 8941-8948.	4.0	8
110	Structural, optical and vibrational properties of self-assembled Pbn+1(Ti1â^'xFex)nO3n+1â^'Î´ Ruddlesden-Popper superstructures. Scientific Reports, 2015, 5, 7719.	3.3	8
111	Structure refinement from â€˜digitalâ€™ large angle convergent beam electron diffraction patterns. Ultramicroscopy, 2019, 198, 1-9.	1.9	8
112	GaAsP/SiGe tandem solar cells on porous Si substrates. Solar Energy, 2021, 230, 925-934.	6.1	8
113	Microstructure of GaAs grown by excimer laser-assisted chemical beam epitaxy. Semiconductor Science and Technology, 1993, 8, 1112-1117.	2.0	7
114	Correction for the loss of depth resolution with accurate depth calibration when profiling with Cs+ at angles of incidence above 50Â° to normal. Applied Surface Science, 2003, 203-204, 260-263.	6.1	7
115	Rapid Cross-Section TEM Specimen Preparation of III-V Materials. Microscopy Today, 2003, 11, 29-32.	0.3	7
116	Nanometer-scale strain measurements in semiconductors: An innovative approach using the plasmon peak in electron energy loss spectra. Applied Physics Letters, 2006, 88, 051917.	3.3	7
117	Hot electron transport and impact ionization in the narrow energy gap InAs1â^'xNx alloy. Applied Physics Letters, 2010, 96, 052115.	3.3	7
118	Photoluminescence of InAs0.926Sb0.063N0.011/InAs multi-quantum wells in the mid-infrared spectral range. Journal Physics D: Applied Physics, 2010, 43, 345103.	2.8	7
119	Absorption, Gain, and Threshold in InP/AlGaInP Quantum Dot Laser Diodes. IEEE Journal of Quantum Electronics, 2013, 49, 389-394.	1.9	7
120	InAsP/AlGaInP/GaAs QD laser operating at â^¼770 nm. Journal of Physics: Conference Series, 2016, 740, 012008.	0.4	7
121	Polarization Screening Mechanisms at La_{0.7}Sr_{0.3}MnO₃â€“PbTiO₃ Interfaces. ACS Applied Materials & Interfaces, 2020, 12, 10657-10663.	8.0	7
122	Spatial distribution of defects in a plastically deformed natural brown diamond. Diamond and Related Materials, 2021, 117, 108465.	3.9	7
123	AC-assisted deposition of aggregate free silica films with vertical pore structure. Nanoscale, 2022, 14, 5404-5411.	5.6	7
124	A novel design method for the suppression of edge dislocation formation in step-graded InGaAs/GaAs layers. Philosophical Magazine A: Physics of Condensed Matter, Structure, Defects and Mechanical Properties, 1996, 73, 1439-1450.	0.6	6
125	High performance 1.3Î¼m InAs/GaAs quantum dot lasers with low threshold current and negative characteristic temperature. , 2006, 6184, 374.		6
126	Site-selective dopant profiling of p-n junction specimens in the dual-beam FIB/SEM system. Journal of Physics: Conference Series, 2010, 209, 012069.	0.4	6

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127	Overcoming Low Ge Ionization and Erosion Rate Variation for Quantitative Ultralow Energy Secondary Ion Mass Spectrometry Depth Profiles of Si1â€“xGex/Ge Quantum Well Structures. Analytical Chemistry, 2012, 84, 2292-2298.	6.5	6
128	High Dynamic Range Electron Imaging: The New Standard. Microscopy and Microanalysis, 2014, 20, 1601-1604.	0.4	6
129	Optical and structural properties of InGaSb/GaAs quantum dots grown by molecular beam epitaxy. Semiconductor Science and Technology, 2018, 33, 125021.	2.0	6
130	Lateral Growth of MoS₂ 2D Material Semiconductors Over an Insulator Via Electrodeposition. Advanced Electronic Materials, 2021, 7, 2100419.	5.1	6
131	A comparison of commercial sources of epitaxial material for GaN HFETs fabrication. Journal of Crystal Growth, 2001, 230, 569-572.	1.5	5
132	Electron tomography of IIIâ€V quantum dots using dark field 002 imaging conditions. Journal of Microscopy, 2010, 237, 148-154.	1.8	5
133	Electrodeposition of Crystalline HgTe from a Non-Aqueous Plating Bath. Journal of the Electrochemical Society, 2018, 165, D802-D807.	2.9	5
134	Defect Dynamics in Self-Catalyzed IIIâ€“V Semiconductor Nanowires. Nano Letters, 2019, 19, 4574-4580.	9.1	5
135	Structural aspects of strained layers I. Application of the Frank-Bilby equation to epitaxial layers. Philosophical Magazine A: Physics of Condensed Matter, Structure, Defects and Mechanical Properties, 1993, 67, 585-603.	0.6	4
136	Optimization of Polysilicon Encapsulated Local Oxidation of Silicon: Cavity Dimension Effects on Mechanical Stress and Gate Oxide Integrity. Journal of the Electrochemical Society, 1998, 145, 1653-1659.	2.9	4
137	The influence of beam energy on apparent layer thickness using ultralow energy O2+ SIMS on surface Si1â^'xGex. Surface and Interface Analysis, 2011, 43, 211-213.	1.8	4
138	Characterizing oxygen atoms in perovskite and pyrochlore oxides using ADF-STEM at a resolution of a few tens of picometers. Acta Materialia, 2021, 208, 116717.	7.9	4
139	ULTRARAM: A Lowâ€Energy, Highâ€Endurance, Compoundâ€Semiconductor Memory on Silicon. Advanced Electronic Materials, 2022, 8, 2101103.	5.1	4
140	Atomic-scale investigation of the reversible Î±- to Ï‰-phase lithium ion charge â€“ discharge characteristics of electrodeposited vanadium pentoxide nanobelts. Journal of Materials Chemistry A, 2022, 10, 8515-8527.	10.3	4
141	Non-uniform strain relaxation in InxGa1â^'xAs layers. Solid-State Electronics, 1996, 40, 647-651.	1.4	3
142	A TEM study of the evolution of InAs/GaAs self-assembled dots on (3â€‰1â€‰1)B GaAs with growth interruption. Semiconductor Science and Technology, 2007, 22, 168-170.	2.0	3
143	Progress towards site-specific dopant profiling in the scanning electron microscope. Journal of Physics: Conference Series, 2010, 209, 012068.	0.4	3
144	On the vertical stacking in semiconducting WSe₂ bilayers. Materials Science and Technology, 2016, 32, 226-231.	1.6	3

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145	GaAsP nanowires and nanowire devices grown on silicon substrates. Proceedings of SPIE, 2017, , .	0.8	3
146	Point defects and interstitial climb of 90Â° partial dislocations in brown type IIa natural diamond. Acta Materialia, 2020, 201, 494-503.	7.9	3
147	Multiple radial phosphorus segregations in GaAsP core-shell nanowires. Nano Research, 2021, 14, 157-164.	10.4	3
148	Electrodeposited WS₂ monolayers on patterned graphene. 2D Materials, 2022, 9, 015025.	4.4	3
149	Tilts in Thin Strained Layers.. Materials Research Society Symposia Proceedings, 1991, 238, 17.	0.1	2
150	Orientations and morphology of Al layers grown on GaAs by chemical beam epitaxy. Journal of Crystal Growth, 1993, 132, 592-598.	1.5	2
151	Tilted Epitaxial Films. Materials Science Forum, 1993, 126-128, 281-284.	0.3	2
152	Observations of sol-gel deposited lead zirconium titanate films using transmission electron microscopy and X-ray diffraction. Integrated Ferroelectrics, 1996, 13, 179-194.	0.7	2
153	Simulation of advanced-LOCOS capability for sub-0.25 micron CMOS isolation. , 0, , .		2
154	Accurate ultraâ€lowâ€energy secondary ion mass spectrometry analysis of wide bandgap GaN/In_xGa_{1â€“x}N structures using optical conductivity enhancement. Rapid Communications in Mass Spectrometry, 2010, 24, 2122-2126.	1.5	2
155	Lattice distortions in GaN thin films on (0001) sapphire. Journal of Physics: Conference Series, 2010, 209, 012022.	0.4	2
156	O2 + probe-sample conditions for ultra low energy SIMS depth profiling of nanometre scale Si0.4 Ge0.6 /Ge quantum wells. Surface and Interface Analysis, 2013, 45, 348-351.	1.8	2
157	Bayesian Estimation of Density via Multiple Sequential Inversions of Two-Dimensional Images With Application to Electron Microscopy. Technometrics, 2015, 57, 217-233.	1.9	2
158	A new electron diffraction approach for structure refinement applied to Ca₃Mn₂O₇. Acta Crystallographica Section A: Foundations and Advances, 2021, 77, 196-207.	0.1	2
159	Confining the growth of mesoporous silica films into nanospaces: towards surface nanopatterning. Nanoscale Advances, 0, , .	4.6	2
160	Dislocation Arrays in Epitaxial Interfaces.. Materials Research Society Symposia Proceedings, 1990, 198, 111.	0.1	1
161	On charge density determinations in intermetallics by quantitative convergent beam electron diffraction. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 1992, 152, 237-239.	5.6	1
162	GROWTH AND CHARACTERIZATION OF MULTI-LAYER 1.3 Î¼m QUANTUM DOT LASERS. International Journal of Nanoscience, 2007, 06, 291-296.	0.7	1

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163	Three-dimensional measurement of composition changes in InAs/GaAs quantum dots. Journal of Physics: Conference Series, 2011, 326, 012048.	0.4	1
164	Improving the SNR of Atomic Resolution STEM EELS & EDX Mapping while Reducing Beam-damage by using Non-rigid Spectrum-image Averaging. Microscopy and Microanalysis, 2015, 21, 1215-1216.	0.4	1
165	Growth and characterisation of InAsP/AlGaInP QD laser structures. , 2016, , .		1
166	Preface of 19th Microscopy of Semiconducting Materials conference. Journal of Microscopy, 2016, 262, 131-133.	1.8	1
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