Karl K Berggren

List of Publications by Year
in descending order

212 papers	11,495 citations	25034 57 h-index	30087 103 g-index
220 all docs	220 docs citations	220 times ranked	9827 citing authors

#	Article	IF	Citations
1	PHz Electronic Device Design and Simulation for Waveguide-Integrated Carrier-Envelope Phase Detection. Journal of Lightwave Technology, 2022, 40, 3823-3831.	4.6	1
2	Broadband Solenoidal Haloscope for Terahertz Axion Detection. Physical Review Letters, 2022, 128, 131801.	7.8	49
3	Electron Emission Regimes of Planar Nano Vacuum Emitters. IEEE Transactions on Electron Devices, 2022, 69, 3953-3959.	3.0	11
4	Electrical control of surface acoustic waves. Nature Electronics, 2022, 5, 348-355.	26.0	22
5	New Constraints on Dark Photon Dark Matter with Superconducting Nanowire Detectors in an Optical Haloscope. Physical Review Letters, 2022, 128, .	7.8	43
6	Surface Plasmon Enhanced Upconversion Fluorescence in Short-Wave Infrared for In Vivo Imaging of Ovarian Cancer. ACS Nano, 2022, 16, 12930-12940.	14.6	3
7	Large-Area Superconducting Nanowire Single-Photon Detectors for Operation at Wavelengths up to 7.4 Î¼m. Nano Letters, 2022, 22, 5667-5673.	9.1	13
8	Roadmap on emerging hardware and technology for machine learning. Nanotechnology, 2021, 32, 012002.	2.6	104
9	Enhancing Plasmonic Spectral Tunability with Anomalous Material Dispersion. Nano Letters, 2021, 21, 91-98.	9.1	6
10	Impedance-matched differential SNSPDs for practical photon counting with sub-10 ps timing jitter. , 2021, , .		1
11	Compact and Tunable Forward Coupler Based on High-Impedance Superconducting Nanowires. Physical Review Applied, 2021, 15, .	3.8	5
12	Development of Quantum Interconnects (QuICs) for Next-Generation Information Technologies. PRX Quantum, 2021, 2, .	9.2	172
13	Superconducting MoN thin films prepared by DC reactive magnetron sputtering for nanowire single-photon detectors. Superconductor Science and Technology, 2021, 34, 035012.	3.5	9
14	Enhancing the performance of superconducting nanowire-based detectors with high-filling factor by using variable thickness. Superconductor Science and Technology, 2021, 34, 035010.	3.5	14
15	Impact of DC bias on weak optical-field-driven electron emission in nano-vacuum-gap detectors. Journal of the Optical Society of America B: Optical Physics, 2021, 38, 1009.	2.1	8
16	On-chip sampling of optical fields with attosecond resolution. Nature Photonics, 2021, 15, 456-460.	31.4	60
17	Single-photon detection in the mid-infrared up to 10 <i>Î¼</i>m wavelength using tungsten silicide superconducting nanowire detectors. APL Photonics, 2021, 6, .	5.7	68
18	Nanoscale refractory doped titanium nitride field emitters. Nanotechnology, 2021, 32, 315208.	2.6	1

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19	Image-histogram-based secondary electron counting to evaluate detective quantum efficiency in SEM. Ultramicroscopy, 2021, 224, 113238.	1.9	3
20	Nanoantenna design for enhanced carrierâ€“envelope-phase sensitivity. Journal of the Optical Society of America B: Optical Physics, 2021, 38, C11.	2.1	8
21	Precise, subnanosecond, and high-voltage switching enabled by gallium nitride electronics integrated into complex loads. Review of Scientific Instruments, 2021, 92, 074704.	1.3	2
22	Electrostatic electron mirror in SEM for simultaneous imaging of top and bottom surfaces of a sample. Ultramicroscopy, 2021, 226, 113304.	1.9	0
23	Physical properties of amorphous molybdenum silicide films for single-photon detectors. Superconductor Science and Technology, 2021, 34, 095003.	3.5	9
24	Development of an Array of Kinetic Inductance Magnetometers (KIMs). IEEE Transactions on Applied Superconductivity, 2021, 31, 1-4.	1.7	1
25	Probing Kinetic Inductance Pulses Below the Hotspot Activation Threshold of a Superconducting Nanowire. IEEE Transactions on Applied Superconductivity, 2021, 31, 1-5.	1.7	1
26	Initial Design of a W-Band Superconducting Kinetic Inductance Qubit. IEEE Transactions on Applied Superconductivity, 2021, 31, 1-5.	1.7	9
27	Long term field emission current stability characterization of planar field emitter devices. Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics, 2021, 39, .	1.2	7
28	A scalable superconducting nanowire memory cell and preliminary array test. Superconductor Science and Technology, 2021, 34, 035003.	3.5	8
29	Real-time dose control for electron-beam lithography. Nanotechnology, 2021, 32, 095302.	2.6	2
30	Determining Dark-Matterâ€“Electron Scattering Rates from the Dielectric Function. Physical Review Letters, 2021, 127, 151802.	7.8	40
31	Emission Behavior of Planar Nano-Vacuum Field Emitters. , 2021, , .		1
32	50â€‰Î© transmission lines with extreme wavelength compression based on superconducting nanowires on high-permittivity substrates. Applied Physics Letters, 2021, 119, .	3.3	2
33	Long Term Stability Study of Planar, Two-terminal Field Emitters. , 2021, , .		0
34	Design and characterization of superconducting nanowire-based processors for acceleration of deep neural network training. Nanotechnology, 2020, 31, 025204.	2.6	8
35	Focused-helium-ion-beam blow forming of nanostructures: radiation damage and nanofabrication. Nanotechnology, 2020, 31, 045302.	2.6	16
36	Single-Photon Single-Flux Coupled Detectors. Nano Letters, 2020, 20, 664-668.	9.1	4

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37	Properties of a Nanowire Kinetic Inductance Detector Array. Journal of Low Temperature Physics, 2020, 199, 631-638.	1.4	1
38	Oscilloscopic Capture of Greater-Than-100 GHz, Ultra-Low Power Optical Waveforms Enabled by Integrated Electrooptic Devices. Journal of Lightwave Technology, 2020, 38, 166-173.	4.6	12
39	Light phase detection with on-chip petahertz electronic networks. Nature Communications, 2020, 11, 3407.	12.8	37
40	Multilayered Heater Nanocryotron: A Superconducting-Nanowire-Based Thermal Switch. Physical Review Applied, 2020, 14, .	3.8	12
41	Superconducting Nanowire Spiking Element for Neural Networks. Nano Letters, 2020, 20, 8059-8066.	9.1	30
42	Fabrication of gold nanostructures using wet lift-off without adhesion promotion. Microelectronic Engineering, 2020, 233, 111420.	2.4	3
43	Nanostructured-membrane electron phase plates. Ultramicroscopy, 2020, 217, 113053.	1.9	2
44	Large-area microwire MoSi single-photon detectors at 1550â€‰nm wavelength. Applied Physics Letters, 2020, 116, .	3.3	49
45	Source shot noise mitigation in focused ion beam microscopy by time-resolved measurement. Ultramicroscopy, 2020, 211, 112948.	1.9	17
46	Demonstration of sub-3 ps temporal resolution with a superconducting nanowire single-photon detector. Nature Photonics, 2020, 14, 250-255.	31.4	285
47	Cryogenic Memory Architecture Integrating Spin Hall Effect based Magnetic Memory and Superconductive Cryotron Devices. Scientific Reports, 2020, 10, 248.	3.3	25
48	Commensurability-Driven Orientation Control during Block Copolymer Directed Self-Assembly. ACS Applied Materials & Interfaces, 2020, 12, 10852-10857.	8.0	5
49	Resolving Photon Numbers Using a Superconducting Nanowire with Impedance-Matching Taper. Nano Letters, 2020, 20, 3858-3863.	9.1	57
50	Electron energy loss of ultraviolet plasmonic modes in aluminum nanodisks. Optics Express, 2020, 28, 27405.	3.4	6
51	Cavity electro-optics in thin-film lithium niobate for efficient microwave-to-optical transduction. Optica, 2020, 7, 1714.	9.3	66
52	Vanishing carrier-envelope-phase-sensitive response in optical-field photoemission from plasmonic nanoantennas. Nature Physics, 2019, 15, 1128-1133.	16.7	27
53	Towards integrated tunable all-silicon free-electron light sources. Nature Communications, 2019, 10, 3176.	12.8	55
54	Detecting Sub-GeV Dark Matter with Superconducting Nanowires. Physical Review Letters, 2019, 123, 151802.	7.8	116

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55	Performance Analysis of Interaction-Free-Measurement-based Electron Microscopy. Microscopy and Microanalysis, 2019, 25, 152-153.	0.4	0
56	Determining the depairing current in superconducting nanowire single-photon detectors. Physical Review B, 2019, 100, .	3.2	31
57	Antiresonant-like behavior in carrier-envelope-phase-sensitive sub-optical-cycle photoemission from plasmonic nanoantennas. EPJ Web of Conferences, 2019, 205, 08011.	0.3	1
58	Design of a Power Efficient Artificial Neuron Using Superconducting Nanowires. Frontiers in Neuroscience, 2019, 13, 933.	2.8	33
59	Investigation of ma-N 2400 series photoresist as an electron-beam resist for superconducting nanoscale devices. Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics, 2019, 37, 051207.	1.2	4
60	Measuring thickness in thin NbN films for superconducting devices. Journal of Vacuum Science and Technology A: Vacuum, Surfaces and Films, 2019, 37, 041501.	2.1	8
61	Enhancement of Optical Response in Nanowires by Negative-Tone PMMA Lithography. IEEE Transactions on Applied Superconductivity, 2019, 29, 1-5.	1.7	3
62	Bridging the Gap Between Nanowires and Josephson Junctions: A Superconducting Device Based on Controlled Fluxon Transfer. Physical Review Applied, 2019, 11, .	3.8	14
63	Demonstration of Microwave Multiplexed Readout of DC-Biased Superconducting Nanowire Detectors. IEEE Transactions on Applied Superconductivity, 2019, 29, 1-4.	1.7	22
64	Jitter Characterization of a Dual-Readout SNSPD. IEEE Transactions on Applied Superconductivity, 2019, 29, 1-4.	1.7	7
65	Design and simulation of a linear electron cavity for quantum electron microscopy. Ultramicroscopy, 2019, 199, 50-61.	1.9	10
66	Superconducting nanowire single-photon detector with integrated impedance-matching taper. Applied Physics Letters, 2019, 114, .	3.3	29
67	A general theoretical and experimental framework for nanoscale electromagnetism. Nature, 2019, 576, 248-252.	27.8	103
68	Operation of a Superconducting Nanowire in Two Detection Modes: KID and SPD. Journal of Low Temperature Physics, 2019, 194, 386-393.	1.4	1
69	A kinetic-inductance-based superconducting memory element with shunting and sub-nanosecond write times. Superconductor Science and Technology, 2019, 32, 015005.	3.5	11
70	Superconducting Nanowire Fabrication using Dislocation Engineering. , 2019, , .		4
71	A superconducting nanowire can be modeled by using SPICE. Superconductor Science and Technology, 2018, 31, 055010.	3.5	39
72	Exploring proximity effects and large depth of field in helium ion beam lithography: large-area dense patterns and tilted surface exposure. Nanotechnology, 2018, 29, 275301.	2.6	12

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73	A compact superconducting nanowire memory element operated by nanowire cryotrons. Superconductor Science and Technology, 2018, 31, 035009.	3.5	40
74	Nano-beam and nano-target effects in ion radiation. Nanoscale, 2018, 10, 1598-1606.	5.6	14
75	Directed self-assembly of a two-state block copolymer system. Nano Convergence, 2018, 5, 25.	12.1	7
76	Optical modeling of superconducting nanowire single photon detectors using the transfer matrix method. Applied Optics, 2018, 57, 4872.	1.8	8
77	Efficient two-port electron beam splitter via a quantum interaction-free measurement. Physical Review A, 2018, 98, .	2.5	7
78	Smithâ€“Purcell Radiation from Low-Energy Electrons. ACS Photonics, 2018, 5, 3513-3518.	6.6	46
79	A distributed electrical model for superconducting nanowire single photon detectors. Applied Physics Letters, 2018, 113, .	3.3	12
80	A scalable multi-photon coincidence detector based on superconducting nanowires. Nature Nanotechnology, 2018, 13, 596-601.	31.5	62
81	Frequency Pulling and Mixing of Relaxation Oscillations in Superconducting Nanowires. Physical Review Applied, 2018, 9, .	3.8	17
82	Nanoscale spirals by directed self-assembly. Nano Futures, 2017, 1, 015001.	2.2	26
83	A nanocryotron comparator can connect single-flux-quantum circuits to conventional electronics. Superconductor Science and Technology, 2017, 30, 044002.	3.5	36
84	Single-photon imager based on a superconducting nanowire delay line. Nature Photonics, 2017, 11, 247-251.	31.4	127
85	Optical-field-controlled photoemission from plasmonic nanoparticles. Nature Physics, 2017, 13, 335-339.	16.7	129
86	Atom sieve for nanometer resolution neutral helium microscopy. Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics, 2017, 35, .	1.2	3
87	Orientational Preference in Multilayer Block Copolymer Nanomeshes with Respect to Layer-to-Layer Commensurability. Macromolecules, 2017, 50, 8258-8266.	4.8	12
88	Mapping Photoemission and Hot-Electron Emission from Plasmonic Nanoantennas. Nano Letters, 2017, 17, 6069-6076.	9.1	57
89	Bias sputtered NbN and superconducting nanowire devices. Applied Physics Letters, 2017, 111, .	3.3	46
90	Superconductorâ€“superconductor bilayers for enhancing single-photon detection. Nanotechnology, 2017, 28, 435205.	2.6	13

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91	Modular assembly of a protein nanotriangle using orthogonally interacting coiled coils. Scientific Reports, 2017, 7, 10577.	3.3	31
92	A nanofabricated, monolithic, path-separated electron interferometer. Scientific Reports, 2017, 7, 1677.	3.3	9
93	Rapid shear alignment of sub-10 nm cylinder-forming block copolymer films based on thermal expansion mismatch. Nano Futures, 2017, 1, 035006.	2.2	4
94	Two-photon detector by using superconducting transmission lines. , 2017, , .		0
95	Monolithic Multi-Grating Diffraction in a Convergent Electron Beam. Microscopy and Microanalysis, 2016, 22, 166-167.	0.4	0
96	The Orientations of Large Aspectâ€Ratio Coiledâ€Coil Proteins Attached to Gold Nanostructures. Small, 2016, 12, 1498-1505.	10.0	2
97	Using Geometry To Sense Current. Nano Letters, 2016, 16, 7626-7631.	9.1	25
98	Microwave dynamics of high aspect ratio superconducting nanowires studied using self-resonance. Journal of Applied Physics, 2016, 119, .	2.5	37
99	Superconducting nanowire detector jitter limited by detector geometry. Applied Physics Letters, 2016, 109, .	3.3	86
100	Designs for a quantum electron microscope. Ultramicroscopy, 2016, 164, 31-45.	1.9	122
101	MoS₂ Field-Effect Transistor with Sub-10 nm Channel Length. Nano Letters, 2016, 16, 7798-7806.	9.1	389
102	nanoSQUID operation using kinetic rather than magnetic induction. Scientific Reports, 2016, 6, 28095.	3.3	12
103	High-Energy Surface and Volume Plasmons in Nanopatterned Sub-10 nm Aluminum Nanostructures. Nano Letters, 2016, 16, 4149-4157.	9.1	38
104	Multilayer block copolymer meshes by orthogonal self-assembly. Nature Communications, 2016, 7, 10518.	12.8	85
105	Free-space-coupled superconducting nanowire single-photon detectors for infrared optical communications. Optics Express, 2016, 24, 3248.	3.4	37
106	Superconducting Nanowire Architectures for Single Photon Detection. Quantum Science and Technology, 2016, , 3-30.	2.6	6
107	AXSIS: Exploring the frontiers in attosecond X-ray science, imaging and spectroscopy. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2016, 829, 24-29.	1.6	80
108	Dimensional Tailoring of Hydrothermally Grown Zinc Oxide Nanowire Arrays. Nano Letters, 2016, 16, 753-759.	9.1	66

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109	Superconducting Nanowire Single-Photon Detector on Aluminum Nitride. , 2016, , .		8
110	Superconducting Nanowire Single-Photon Detectors and Nanowire-Based Superconducting On-Chip Electronics. , 2016, , .		0
111	Self-assembly of block copolymers by graphoepitaxy. , 2015, , 199-232.		3
112	Large-area NbN superconducting nanowire avalanche photon detectors with saturated detection efficiency. Proceedings of SPIE, 2015, , .	0.8	0
113	Control of zinc oxide nanowire array properties with electron-beam lithography templating for photovoltaic applications. Nanotechnology, 2015, 26, 075303.	2.6	30
114	On-chip detection of non-classical light by scalable integration of single-photon detectors. Nature Communications, 2015, 6, 5873.	12.8	238
115	Infrared transmissometer to measure the thickness of NbN thin films. Applied Optics, 2015, 54, 5743.	2.1	3
116	Low-jitter single-photon detector arrays integrated with silicon and aluminum nitride photonic chips. , 2015, , .		0
117	Saturated Photon Detection Efficiency in NbN Superconducting Photon Detectors. , 2015, , .		1
118	Fabrication Process Yielding Saturated Nanowire Single-Photon Detectors With 24-ps Jitter. IEEE Journal of Selected Topics in Quantum Electronics, 2015, 21, 1-7.	2.9	27
119	Eight-fold signal amplification of a superconducting nanowire single-photon detector using a multiple-avalanche architecture. Optics Express, 2014, 22, 24574.	3.4	12
120	Universal scaling of the critical temperature for thin films near the superconducting-to-insulating transition. Physical Review B, 2014, 90, .	3.2	70
121	Three-dimensional nanofabrication using hydrogen silsesquioxane/poly(methylmethacrylate) bilayer resists. Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics, 2014, 32, .	1.2	5
122	Selfâ€Assembly: Sacrificialâ€Post Templating Method for Block Copolymer Selfâ€Assembly (Small 3/2014). Small, 2014, 10, 418-418.	10.0	0
123	Sacrificialâ€Post Templating Method for Block Copolymer Selfâ€Assembly. Small, 2014, 10, 493-499.	10.0	25
124	High-Yield, Ultrafast, Surface Plasmon-Enhanced, Au Nanorod Optical Field Electron Emitter Arrays. ACS Nano, 2014, 8, 11474-11482.	14.6	67
125	A Superconducting-Nanowire Three-Terminal Electrothermal Device. Nano Letters, 2014, 14, 5748-5753.	9.1	116
126	Threeâ€Dimensional Nanofabrication by Block Copolymer Selfâ€Assembly. Advanced Materials, 2014, 26, 4386-4396.	21.0	155

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127	Determining the Resolution Limits of Electron-Beam Lithography: Direct Measurement of the Point-Spread Function. Nano Letters, 2014, 14, 4406-4412.	9.1	67
128	Design rules for self-assembled block copolymer patterns using tiled templates. Nature Communications, 2014, 5, 3305.	12.8	78
129	Controlled placement of colloidal quantum dots in sub-15 nm clusters. Nanotechnology, 2013, 24, 125302.	2.6	16
130	Superconducting-nanowire single-photon-detector linear array. Applied Physics Letters, 2013, 103, 142602.	3.3	37
131	Resolution Limits of Electron-Beam Lithography toward the Atomic Scale. Nano Letters, 2013, 13, 1555-1558.	9.1	350
132	On-fiber assembly of membrane-integrated superconducting-nanowire single-photon detectors. , 2013, , .		1
133	Improvement of infrared single-photon detectors absorptance by integrated plasmonic structures. Scientific Reports, 2013, 3, 2406.	3.3	17
134	Detectors Based on Superconductors. Experimental Methods in the Physical Sciences, 2013, 45, 185-216.	0.1	1
135	Optimized polar-azimuthal orientations for polarized light illumination of different superconducting nanowire single-photon detector designs. Journal of Nanophotonics, 2012, 6, 063523.	1.0	3
136	Efficient Single Photon Detection From 0.5 To 5 Micron Wavelength. , 2012, , .		2
137	Cavity-Integrated Ultra-Narrow Superconducting Nanowire Single-Photon Detector Based on a Thick Niobium Nitride Film. , 2012, , .		2
138	Afterpulsing and instability in superconducting nanowire avalanche photodetectors. Applied Physics Letters, 2012, 100, .	3.3	43
139	Timing performance of 30-nm-wide superconducting nanowire avalanche photodetectors. Applied Physics Letters, 2012, 100, .	3.3	31
140	Topographic Templating: Rectangular Symmetry Morphologies in a Topographically Templated Block Copolymer (Adv. Mater. 31/2012). Advanced Materials, 2012, 24, 4343-4343.	21.0	1
141	Aligned Sub-10-nm Block Copolymer Patterns Templated by Post Arrays. ACS Nano, 2012, 6, 2071-2077.	14.6	74
142	Efficient Single Photon Detection from 500 nm to 5 Î¼m Wavelength. Nano Letters, 2012, 12, 4799-4804.	9.1	155
143	Modeling the Pointâ€Spread Function in Heliumâ€Ion Lithography. Scanning, 2012, 34, 121-128.	1.5	20
144	Single Photon Counting from Individual Nanocrystals in the Infrared. Nano Letters, 2012, 12, 2953-2958.	9.1	48

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145	Rectangular Symmetry Morphologies in a Topographically Templated Block Copolymer. Advanced Materials, 2012, 24, 4249-4254.	21.0	29
146	Critical-current reduction in thin superconducting wires due to current crowding. Applied Physics Letters, 2012, 100, .	3.3	84
147	Assembly of Sub-10-nm Block Copolymer Patterns with Mixed Morphology and Period Using Electron Irradiation and Solvent Annealing. Nano Letters, 2011, 11, 5079-5084.	9.1	113
148	Geometry-dependent critical currents in superconducting nanocircuits. Physical Review B, 2011, 84, .	3.2	193
149	Single-Photon Detectors Based on Ultranarrow Superconducting Nanowires. Nano Letters, 2011, 11, 2048-2053.	9.1	167
150	Highly Ordered Square Arrays from a Templated ABC Triblock Terpolymer. Nano Letters, 2011, 11, 2849-2855.	9.1	55
151	Neon Ion Beam Lithography (NIBL). Nano Letters, 2011, 11, 4343-4347.	9.1	69
152	Lithography. Nanoscale, 2011, 3, 2662.	5.6	5
153	Numerical method to optimize the polar-azimuthal orientation of infrared superconducting-nanowire single-photon detectors. Applied Optics, 2011, 50, 5949.	2.1	9
154	Superconducting nanowire single-photon detectors integrated with optical nano-antennae. Optics Express, 2011, 19, 17.	3.4	112
155	Polar-azimuthal angle dependent efficiency of different infrared superconducting nanowire single-photon detector designs. Proceedings of SPIE, 2011, , .	0.8	1
156	Sub-5keV electron-beam lithography in hydrogen silsesquioxane resist. Microelectronic Engineering, 2011, 88, 3070-3074.	2.4	19
157	Controlled Collapse of Highâ€Aspectâ€Ratio Nanostructures. Small, 2011, 7, 2661-2668.	10.0	44
158	Electrochemical development of hydrogen silsesquioxane by applying an electrical potential. Nanotechnology, 2011, 22, 375301.	2.6	6
159	<i>In situ</i> study of hydrogen silsesquioxane dissolution rate in salty and electrochemical developers. Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics, 2011, 29, 06FJ01.	1.2	8
160	The Scanning Electron Microscope As An Accelerator For The Undergraduate Advanced Physics Laboratory. , 2011, , .		0
161	Superconducting nanowire single photon detectors. , 2011, , .		6
162	Electrothermal simulation of superconducting nanowire avalanche photodetectors. Applied Physics Letters, 2011, 98, .	3.3	30

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163	Templated self-assembly of Si-containing block copolymers for nanoscale device fabrication. Proceedings of SPIE, 2010, , .	0.8	9
164	Complex self-assembled patterns using sparse commensurate templates with locally varying motifs. Nature Nanotechnology, 2010, 5, 256-260.	31.5	245
165	Superconducting microfabricated ion traps. Applied Physics Letters, 2010, 97, .	3.3	39
166	Metrology for electron-beam lithography and resist contrast at the sub-10 nm scale. Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics, 2010, 28, C6H11-C6H17.	1.2	38
167	Development of a simple, compact, low-cost interference lithography system. Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics, 2010, 28, C6Q20-C6Q24.	1.2	19
168	Sub-10-nm half-pitch electron-beam lithography by using poly(methyl methacrylate) as a negative resist. Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics, 2010, 28, C6C58-C6C62.	1.2	86
169	A Path to Ultranarrow Patterns Using Self-Assembled Lithography. Nano Letters, 2010, 10, 1000-1005.	9.1	229
170	Directed Self-Assembly at the 10 nm Scale by Using Capillary Force-Induced Nanocohesion. Nano Letters, 2010, 10, 3710-3716.	9.1	114
171	Sub-10 nm structures on silicon by thermal dewetting of platinum. Nanotechnology, 2010, 21, 505301.	2.6	86
172	Enhancing the Potential of Block Copolymer Lithography with Polymer Self-Consistent Field Theory Simulations. Macromolecules, 2010, 43, 8290-8295.	4.8	38
173	High-quality fiber-optic polarization entanglement distribution at 13â€‰Î¼m telecom wavelength. Optics Letters, 2010, 35, 1392.	3.3	47
174	High-order temporal coherences ofâ€¨chaotic and laser light. Optics Express, 2010, 18, 1430.	3.4	60
175	Pulse imaging and nonadiabatic control of solid-state artificial atoms. Physical Review B, 2009, 80, .	3.2	26
176	Sub-15nm nanoimprint molds and pattern transfer. Journal of Vacuum Science & Technology B, 2009, 27, 2837-2840.	1.3	42
177	Scanning-helium-ion-beam lithography with hydrogen silsesquioxane resist. Journal of Vacuum Science & Technology B, 2009, 27, 2702-2706.	1.3	95
178	Low-cost interference lithography. Journal of Vacuum Science & Technology B, 2009, 27, 2958.	1.3	31
179	Fiber-coupled nanowire photon counter at 1550 nm with 24% system detection efficiency. Optics Letters, 2009, 34, 3607.	3.3	51
180	Photon-number-resolution with sub-30-ps timing using multi-element superconducting nanowire single photon detectors. Journal of Modern Optics, 2009, 56, 364-373.	1.3	122

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181	Suppressed Critical Current in Superconducting Nanowire Single-Photon Detectors With High Fill-Factors. IEEE Transactions on Applied Superconductivity, 2009, 19, 318-322.	1.7	24
182	Limiting factors in sub-10â€,nm scanning-electron-beam lithography. Journal of Vacuum Science & Technology B, 2009, 27, 2616.	1.3	55
183	Understanding of hydrogen silsesquioxane electron resist for sub-5-nm-half-pitch lithography. Journal of Vacuum Science & Technology B, 2009, 27, 2622-2627.	1.3	148
184	Electrothermal feedback in superconducting nanowire single-photon detectors. Physical Review B, 2009, 79, .	3.2	132
185	Contrast enhancement behavior of hydrogen silsesquioxane in a salty developer. Journal of Vacuum Science & Technology B, 2009, 27, 2635-2639.	1.3	26
186	Amplitude spectroscopy of a solid-state artificial atom. Nature, 2008, 455, 51-57.	27.8	134
187	Measuring intensity correlations with a two-element superconducting nanowire single-photon detector. Physical Review A, 2008, 78, .	2.5	15
188	Graphoepitaxy of Self-Assembled Block Copolymers on Two-Dimensional Periodic Patterned Templates. Science, 2008, 321, 939-943.	12.6	760
189	Optical properties of superconducting nanowire single-photon detectors. Optics Express, 2008, 16, 10750.	3.4	146
190	Sub-10 nm Nanoimprint Lithography by Wafer Bowing. Nano Letters, 2008, 8, 3865-3869.	9.1	75
191	Using high-contrast salty development of hydrogen silsesquioxane for sub-10-nm half-pitch lithography. Journal of Vacuum Science & Technology B, 2007, 25, 2025-2029.	1.3	167
192	Nonlinear resonant behavior of a dispersive readout circuit for a superconducting flux qubit. Physical Review B, 2007, 75, .	3.2	19
193	Pattern Generation by Using Multistep Room-Temperature Nanoimprint Lithography. IEEE Nanotechnology Magazine, 2007, 6, 639-644.	2.0	5
194	Demonstration of gigabit-per-second and higher data rates at extremely high efficiency using superconducting nanowire single photon detectors. , 2007, , .		5
195	Modeling the Electrical and Thermal Response of Superconducting Nanowire Single-Photon Detectors. IEEE Transactions on Applied Superconductivity, 2007, 17, 581-585.	1.7	174
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