

# Lay Kee Ang

## List of Publications by Year in Descending Order

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

181 papers	4,995 citations	39 h-index	61 g-index
251 ext. papers	6,369 ext. citations	5.1 avg, IF	6.28 L-index

#	Paper	IF	Citations
181	Giant tunneling magnetoresistance in atomically thin VSi <sub>2</sub> N <sub>4</sub> /MoSi <sub>2</sub> N <sub>4</sub> /VSi <sub>2</sub> N <sub>4</sub> magnetic tunnel junction. <i>Applied Physics Letters</i> , <b>2022</b> , 120, 022401	3.4	3
180	Plexcitonic strong coupling: unique features, applications, and challenges. <i>Journal Physics D: Applied Physics</i> , <b>2022</b> , 55, 203002	3	4
179	High-Performance Thermionic Energy Converters Based on CdAs <sub>2</sub> Anode. <i>IEEE Transactions on Electron Devices</i> , <b>2022</b> , 1-7	2.9	
178	Tunable electronic properties and band alignments of MoSi <sub>2</sub> N <sub>4</sub> /GaN and MoSi <sub>2</sub> N <sub>4</sub> /ZnO van der Waals heterostructures. <i>Applied Physics Letters</i> , <b>2022</b> , 120, 103101	3.4	4
177	Field Emission in Emerging Two-Dimensional and Topological Materials: A Perspective. <i>IEEE Transactions on Plasma Science</i> , <b>2022</b> , 1-15	1.3	3
176	Electron acceleration based on Bloch surface waves. <i>Physics of Plasmas</i> , <b>2022</b> , 29, 063105	2.1	
175	Deep learning-based design of broadband GHz complex and random metasurfaces. <i>APL Photonics</i> , <b>2021</b> , 6, 106101	5.2	1
174	Concentrated thermionic solar cells using graphene as the collector: theoretical efficiency limit and design rules. <i>Nanotechnology</i> , <b>2021</b> , 33,	3.4	1
173	Semiconductor-to-metal transition in bilayer MoSi <sub>2</sub> N <sub>4</sub> and WSi <sub>2</sub> N <sub>4</sub> with strain and electric field. <i>Applied Physics Letters</i> , <b>2021</b> , 118, 113102	3.4	27
172	Angle-Insensitive Toroidal Metasurface for High-Efficiency Sensing. <i>IEEE Transactions on Microwave Theory and Techniques</i> , <b>2021</b> , 69, 1511-1517	4.1	3
171	Strongly anisotropic field emission from highly aligned carbon nanotube films. <i>Journal of Applied Physics</i> , <b>2021</b> , 129, 125103	2.5	6
170	Space-charge limited current in nanodiodes: Ballistic, collisional, and dynamical effects. <i>Journal of Applied Physics</i> , <b>2021</b> , 129, 100902	2.5	45
169	Two-dimensional van der Waals electrical contact to monolayer MoSi <sub>2</sub> N <sub>4</sub> . <i>Applied Physics Letters</i> , <b>2021</b> , 118, 013106	3.4	54
168	Designing few-layer graphene Schottky contact solar cells: Theoretical efficiency limits and parametric optimization. <i>Applied Physics Letters</i> , <b>2021</b> , 118, 053103	3.4	7
167	ZnSe Modified Zinc Metal Anodes: Toward Enhanced Zincophilicity and Ionic Diffusion. <i>Small</i> , <b>2021</b> , 17, e2101728	11	24
166	Efficient Ohmic contacts and built-in atomic sublayer protection in MoSi <sub>2</sub> N <sub>4</sub> and WSi <sub>2</sub> N <sub>4</sub> monolayers. <i>Npj 2D Materials and Applications</i> , <b>2021</b> , 5,	8.8	25
165	Design of an all-day electrical power generator based on thermoradiative devices. <i>Science China Technological Sciences</i> , <b>2021</b> , 64, 2166	3.5	4

164	Ultrasensitive Optical Temperature Transducers Based on Surface Plasmon Resonance Enhanced Composited Goos-Hänchen and Imbert-Fedorov Shifts. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , <b>2021</b> , 27, 1-8	3.8	6
163	Physics of electron emission and injection in two-dimensional materials: Theory and simulation. <i>Information Materials</i> , <b>2021</b> , 3, 502-535	23.1	19
162	Superior and tunable gas sensing properties of Janus PtSSe monolayer. <i>Nano Express</i> , <b>2020</b> , 1, 010042	2	8
161	Electrical Contact between an Ultrathin Topological Dirac Semimetal and a Two-Dimensional Material. <i>Physical Review Applied</i> , <b>2020</b> , 13,	4.3	11
160	Broadband strong optical dichroism in topological Dirac semimetals with Fermi velocity anisotropy. <i>Chinese Physics B</i> , <b>2020</b> , 29, 077802	1.2	3
159	Reducing Contact Resistance in Two-Dimensional-Material-Based Electrical Contacts by Roughness Engineering. <i>Physical Review Applied</i> , <b>2020</b> , 13,	4.3	17
158	Plasmon-Enhanced Resonant Photoemission Using Atomically Thick Dielectric Coatings. <i>ACS Nano</i> , <b>2020</b> , 14, 8806-8815	16.7	12
157	Multi-level information fusion to alleviate network congestion. <i>Information Fusion</i> , <b>2020</b> , 63, 248-255	16.7	39
156	Super-Andreev reflection and longitudinal shift of pseudospin-1 fermions. <i>Physical Review B</i> , <b>2020</b> , 101,	3.3	2
155	Generalized Scaling Law for Exciton Binding Energy in Two-Dimensional Materials. <i>Physical Review Applied</i> , <b>2020</b> , 13,	4.3	7
154	Super Kinetically Pseudocapacitive MnCo <sub>2</sub> S <sub>4</sub> Nanourchins toward High-Rate and Highly Stable Sodium-Ion Storage. <i>Advanced Functional Materials</i> , <b>2020</b> , 30, 1909702	15.6	23
153	Interface engineering by atomically thin layer tungsten disulfide catalyst for high performance LiS battery. <i>Materials Today Energy</i> , <b>2020</b> , 16, 100380	7	10
152	Dirac terahertz plasmonics in two and three dimensions. <i>Optics Communications</i> , <b>2020</b> , 462, 125319	2	5
151	Electronic properties and spintronic applications of carbon phosphide nanoribbons. <i>Physical Review B</i> , <b>2020</b> , 101,	3.3	4
150	Morphological and Electronic Dual Regulation of Cobalt-Nickel Bimetal Phosphide Heterostructures Inducing High Water-Splitting Performance. <i>Journal of Physical Chemistry Letters</i> , <b>2020</b> , 11, 3911-3919	6.4	18
149	Efficient generation of extreme terahertz harmonics in three-dimensional Dirac semimetals. <i>Physical Review Research</i> , <b>2020</b> , 2,	3.9	13
148	Designing high-performance nighttime thermoradiative systems for harvesting energy from outer space. <i>Optics Letters</i> , <b>2020</b> , 45, 5929-5932	3	3
147	Particle simulation of plasmons. <i>Nanophotonics</i> , <b>2020</b> , 9, 3303-3313	6.3	4

146	Tunable band alignment in boron carbon nitride and blue phosphorene van der Waals heterostructure. <i>Nano Express</i> , <b>2020</b> , 1, 020021	2	0
145	Shortcut to adiabatic light transfer in waveguide couplers with a sign flip in the phase mismatch. <i>Journal Physics D: Applied Physics</i> , <b>2020</b> , 53, 035104	3	5
144	Imaging nodal knots in momentum space through topoelectrical circuits. <i>Nature Communications</i> , <b>2020</b> , 11, 4385	17.4	17
143	Quantum Transport in Two-Dimensional WS with High-Efficiency Carrier Injection through Indium Alloy Contacts. <i>ACS Nano</i> , <b>2020</b> , 14, 13700-13708	16.7	7
142	Graphene-based thermionic-thermoradiative solar cells: Concept, efficiency limit, and optimum design. <i>Journal of Cleaner Production</i> , <b>2020</b> , 242, 118444	10.3	13
141	Microstructural Engineering of Cathode Materials for Advanced Zinc-Ion Aqueous Batteries. <i>Advanced Science</i> , <b>2020</b> , 8, 2002722	13.6	21
140	High-Concentration Niobium-Substituted WS Basal Domains with Reconfigured Electronic Band Structure for Hydrogen Evolution Reaction. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2019</b> , 11, 34862-34868	8.5	11
139	Theory of Thermionic Carrier Injection in Graphene/Organic Schottky Interface. <i>Frontiers in Materials</i> , <b>2019</b> , 6,	4	6
138	Effects of precursor pre-treatment on the vapor deposition of WS <sub>2</sub> monolayers. <i>Nanoscale Advances</i> , <b>2019</b> , 1, 953-960	5.1	7
137	Nonlinear plasmonics of three-dimensional Dirac semimetals. <i>APL Photonics</i> , <b>2019</b> , 4, 034402	5.2	32
136	High Sensitivity Surface Plasmon Resonance Sensor Based on Two-Dimensional MXene and Transition Metal Dichalcogenide: A Theoretical Study. <i>Nanomaterials</i> , <b>2019</b> , 9,	5.4	65
135	Explicating the Sodium Storage Kinetics and Redox Mechanism of Highly Pseudocapacitive Binary Transition Metal Sulfide via Operando Techniques and Ab Initio Evaluation. <i>Small Methods</i> , <b>2019</b> , 3, 1900112	12.8	14
134	Rhenium disulfide nanosheets/carbon composite as novel anodes for high-rate and long lifespan sodium-ion batteries. <i>Nano Energy</i> , <b>2019</b> , 61, 626-636	17.1	29
133	Fast-neutron irradiation effects on monolayer MoS <sub>2</sub> . <i>Applied Physics Express</i> , <b>2019</b> , 12, 056001	2.4	3
132	Three-terminal heterojunction bipolar transistor solar cells with non-ideal effects: Efficiency limit and parametric optimum selection. <i>Energy Conversion and Management</i> , <b>2019</b> , 188, 112-119	10.6	9
131	Optical Refractive Index Sensors with Plasmonic and Photonic Structures: Promising and Inconvenient Truth. <i>Advanced Optical Materials</i> , <b>2019</b> , 7, 1801433	8.1	156
130	Surface Exciton Polaritons: A Promising Mechanism for Refractive-Index Sensing. <i>Physical Review Applied</i> , <b>2019</b> , 12,	4.3	13
129	Generalized High-Energy Thermionic Electron Injection at Graphene Interface. <i>Physical Review Applied</i> , <b>2019</b> , 12,	4.3	28

128	Design of metal contacts for monolayer Fe <sub>3</sub> GeTe <sub>2</sub> based devices. <i>Applied Physics Letters</i> , <b>2019</b> , 115, 083105	10.5	11
127	Hybrid direct carbon fuel cell-thermoradiative systems for high-efficiency waste-heat recovery. <i>Energy Conversion and Management</i> , <b>2019</b> , 198, 111842	10.6	3
126	Graphene-Induced in Situ Growth of Monolayer and Bilayer 2D SiC Crystals Toward High-Temperature Electronics. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2019</b> , 11, 39109-39115	9.5	7
125	In situ epitaxial engineering of graphene and h-BN lateral heterostructure with a tunable morphology comprising h-BN domains. <i>NPG Asia Materials</i> , <b>2019</b> , 11,	10.3	22
124	Optical Kerr effect and third harmonic generation in topological Dirac/Weyl semimetal. <i>Optics Express</i> , <b>2019</b> , 27, 38270-38280	3.3	11
123	Design of an InSb thermoradiative system for harvesting low-grade waste heat. <i>Optics Letters</i> , <b>2019</b> , 44, 3354-3357	3	9
122	Thermal-Assisted Vertical Electron Injections in Few-Layer Pyramidal-Structured MoS Crystals. <i>Journal of Physical Chemistry Letters</i> , <b>2019</b> , 10, 1292-1299	6.4	5
121	Design Multifunctional Catalytic Interface: Toward Regulation of Polysulfide and Li S Redox Conversion in Li-S Batteries. <i>Small</i> , <b>2019</b> , 15, e1906132	11	35
120	Janus PtSSe and graphene heterostructure with tunable Schottky barrier. <i>Applied Physics Letters</i> , <b>2019</b> , 115, 241601	3.4	40
119	MoS <sub>2</sub> -Based Highly Sensitive Near-Infrared Surface Plasmon Resonance Refractive Index Sensor. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , <b>2019</b> , 25, 1-7	3.8	24
118	From Self-Assembly Hierarchical h-BN Patterns to Centimeter-Scale Uniform Monolayer h-BN Film. <i>Advanced Materials Interfaces</i> , <b>2019</b> , 6, 1801493	4.6	14
117	Two-dimensional transition metal dichalcogenides mediated long range surface plasmon resonance biosensors. <i>Journal Physics D: Applied Physics</i> , <b>2019</b> , 52, 065101	3	38
116	Spoof Surface Plasmonic Graphene for Controlling the Transports and Emissions of Electromagnetic Waves. <i>IEEE Transactions on Microwave Theory and Techniques</i> , <b>2019</b> , 67, 50-56	4.1	5
115	A new coupling mechanism between two graphene electron waveguides for ultrafast switching. <i>Semiconductor Science and Technology</i> , <b>2018</b> , 33, 035014	1.8	7
114	Bifunctional porous iron phosphide/carbon nanostructure enabled high-performance sodium-ion battery and hydrogen evolution reaction. <i>Energy Storage Materials</i> , <b>2018</b> , 15, 98-107	19.4	80
113	Thickness Dependence of Space-Charge-Limited Current in Spatially Disordered Organic Semiconductors. <i>IEEE Transactions on Electron Devices</i> , <b>2018</b> , 65, 3421-3429	2.9	20
112	Universal Scaling Laws in Schottky Heterostructures Based on Two-Dimensional Materials. <i>Physical Review Letters</i> , <b>2018</b> , 121, 056802	7.4	80
111	Tailoring NiO Nanostructured Arrays by Sulfate Anions for Sodium-Ion Batteries. <i>Small</i> , <b>2018</b> , 14, e1800898	11.2	29

110	Adiabatic control of surface plasmon-polaritons in a 3-layers graphene curved configuration. <i>Carbon</i> , <b>2018</b> , 127, 187-192	10.4	18
109	Fractional Fresnel coefficients for optical absorption in femtosecond laser-induced rough metal surfaces. <i>Journal of Applied Physics</i> , <b>2018</b> , 124, 163101	2.5	7
108	Fractional Fowler-Nordheim Law for Field Emission From Rough Surface With Nonparabolic Energy Dispersion. <i>IEEE Transactions on Electron Devices</i> , <b>2018</b> , 65, 2089-2095	2.9	37
107	Asymmetric Schottky Contacts in Bilayer MoS <sub>2</sub> Field Effect Transistors. <i>Advanced Functional Materials</i> , <b>2018</b> , 28, 1800657	15.6	119
106	Pushing the limits of CMOS optical parametric amplifiers with USRN:SiN above the two-photon absorption edge. <i>Nature Communications</i> , <b>2017</b> , 8, 13878	17.4	92
105	Concurrent Synthesis of High-Performance Monolayer Transition Metal Disulfides. <i>Advanced Functional Materials</i> , <b>2017</b> , 27, 1605896	15.6	31
104	Thermionic Energy Conversion Based on Graphene van der Waals Heterostructures. <i>Scientific Reports</i> , <b>2017</b> , 7, 46211	4.9	46
103	Electrical transport and persistent photoconductivity in monolayer MoS phototransistors. <i>Nanotechnology</i> , <b>2017</b> , 28, 214002	3.4	133
102	Cubic-shaped WS <sub>2</sub> nanopetals on a Prussian blue derived nitrogen-doped carbon nanoporous framework for high performance sodium-ion batteries. <i>Journal of Materials Chemistry A</i> , <b>2017</b> , 5, 10406-10415	13.77	77
101	Enhanced stability of filament-type resistive switching by interface engineering. <i>Scientific Reports</i> , <b>2017</b> , 7, 43664	4.9	44
100	100 years of the physics of diodes. <i>Applied Physics Reviews</i> , <b>2017</b> , 4, 011304	17.3	104
99	Synergistic Effects of Plasmonics and Electron Trapping in Graphene Short-Wave Infrared Photodetectors with Ultrahigh Responsivity. <i>ACS Nano</i> , <b>2017</b> , 11, 430-437	16.7	153
98	Cross-plane Thermoelectric and Thermionic Transport across Au/h-BN/Graphene Heterostructures. <i>Scientific Reports</i> , <b>2017</b> , 7, 14148	4.9	11
97	All-optical control on a graphene-on-silicon waveguide modulator. <i>Scientific Reports</i> , <b>2017</b> , 7, 12748	4.9	29
96	Valleytronics in merging Dirac cones: All-electric-controlled valley filter, valve, and universal reversible logic gate. <i>Physical Review B</i> , <b>2017</b> , 96,	3.3	62
95	Theoretical modeling of electron emission from graphene. <i>MRS Bulletin</i> , <b>2017</b> , 42, 505-510	3.2	43
94	Relativistic space-charge-limited current for massive Dirac fermions. <i>Physical Review B</i> , <b>2017</b> , 95,	3.3	14
93	Electronic Scattering of Graphene Plasmons in the Terahertz Nonlinear Regime. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , <b>2017</b> , 23, 1-6	3.8	13

92	Transition radiation from graphene plasmons by a bunch beam in the terahertz regime. <i>Optics Express</i> , <b>2017</b> , 25, 20477-20485	3.3	13
91	Nonlocal transistor based on pure crossed Andreev reflection in a EuO-graphene/superconductor hybrid structure. <i>Physical Review B</i> , <b>2016</b> , 93,	3.3	25
90	WS <sub>2</sub> /D graphene nano-architecture networks for high performance anode materials of lithium ion batteries. <i>RSC Advances</i> , <b>2016</b> , 6, 107768-107775	3.7	24
89	Electromagnetic sinc Schell-model pulses in dispersive media. <i>Physics Letters, Section A: General, Atomic and Solid State Physics</i> , <b>2016</b> , 380, 794-797	2.3	8
88	Guided Modes in a Double-Well Asymmetric Potential of a Graphene Waveguide. <i>Electronics (Switzerland)</i> , <b>2016</b> , 5, 87	2.6	2
87	Fractional-dimensional Child-Langmuir law for a rough cathode. <i>Physics of Plasmas</i> , <b>2016</b> , 23, 072118	2.1	31
86	Ultrafast, broadband, and configurable midinfrared all-optical switching in nonlinear graphene plasmonic waveguides. <i>APL Photonics</i> , <b>2016</b> , 1, 046101	5.2	32
85	A modified Schottky model for graphene-semiconductor (3D/2D) contact: A combined theoretical and experimental study <b>2016</b> ,		17
84	Current-Temperature Scaling for a Schottky Interface with Nonparabolic Energy Dispersion. <i>Physical Review Applied</i> , <b>2016</b> , 6,	4.3	42
83	2D Black Phosphorus/SrTiO <sub>3</sub> -Based Programmable Photoconductive Switch. <i>Advanced Materials</i> , <b>2016</b> , 28, 7768-73	24	44
82	Guided modes in a triple-well graphene waveguide: analogy of five-layer optical waveguide. <i>Journal of Optics (United Kingdom)</i> , <b>2015</b> , 17, 035005	1.7	4
81	Space charge limited current emission for a sharp tip. <i>Physics of Plasmas</i> , <b>2015</b> , 22, 052106	2.1	28
80	Efficiencies of Aloof-Scattered Electron Beam Excitation of Metal and Graphene Plasmons. <i>IEEE Transactions on Plasma Science</i> , <b>2015</b> , 43, 951-956	1.3	10
79	Non-uniform space charge limited current injection into a nano contact solid. <i>Scientific Reports</i> , <b>2015</b> , 5, 9173	4.9	11
78	Wavelength selective mode division multiplexing on a silicon chip. <i>Optics Express</i> , <b>2015</b> , 23, 8095-103	3.3	33
77	Enhancement of coherent Smith-Purcell radiation at terahertz frequency by optimized grating, prebunched beams, and open cavity. <i>Physical Review Special Topics: Accelerators and Beams</i> , <b>2015</b> , 18,		23
76	Engineering the Nonlinearity and Dispersion of Graphene Hybrid Plasmonic Waveguides <b>2015</b> ,		2
75	Maximal charge injection of consecutive electron pulses with uniform temporal pulse separation. <i>Physics of Plasmas</i> , <b>2015</b> , 22, 084504	2.1	8



74	Highly Efficient Midinfrared On-Chip Electrical Generation of Graphene Plasmons by Inelastic Electron Tunneling Excitation. <i>Physical Review Applied</i> , <b>2015</b> , 3,	4.3	15
73	Electron Thermionic Emission from Graphene and a Thermionic Energy Converter. <i>Physical Review Applied</i> , <b>2015</b> , 3,	4.3	120
72	Maximal charge injection of a uniform separated electron pulse train in a drift space. <i>Physical Review Special Topics: Accelerators and Beams</i> , <b>2015</b> , 18,		2
71	Chiral Tunneling-Assisted Over-Barrier Electron Emission From Graphene. <i>IEEE Transactions on Electron Devices</i> , <b>2014</b> , 61, 1764-1770	2.9	39
70	Two-dimensional relativistic space charge limited current flow in the drift space. <i>Physics of Plasmas</i> , <b>2014</b> , 21, 043101	2.1	6
69	Waveguide engineering of graphene's nonlinearity. <i>Applied Physics Letters</i> , <b>2014</b> , 105, 111110	3.4	35
68	Single-Crystal Pd and its Alloy Nanowires for Plasmon Propagation and Highly Sensitive Hydrogen Detection. <i>Advanced Optical Materials</i> , <b>2014</b> , 2, 189-196	8.1	40
67	Transition from ultrafast laser photo-electron emission to space-charge-limited current in a 1D gap. <i>Journal Physics D: Applied Physics</i> , <b>2014</b> , 47, 125502	3	3
66	Electro-optical graphene plasmonic logic gates. <i>Optics Letters</i> , <b>2014</b> , 39, 1629-32	3	59
65	Novel scaling laws for the Langmuir-Blodgett solutions in cylindrical and spherical diodes. <i>Physical Review Letters</i> , <b>2013</b> , 110, 265007	7.4	43
64	Time-dependent quantum tunneling and nonequilibrium heating model for the generalized Einstein photoelectric effect. <i>Physical Review B</i> , <b>2013</b> , 88,	3.3	19
63	Over-barrier side-band electron emission from graphene with a time-oscillating potential. <i>Carbon</i> , <b>2013</b> , 61, 294-298	10.4	42
62	Generalized model for ultrafast laser induced electron emission from a metal tip. <i>Physics of Plasmas</i> , <b>2013</b> , 20, 056705	2.1	12
61	Mid-infrared active graphene nanoribbon plasmonic waveguide devices. <i>Journal of the Optical Society of America B: Optical Physics</i> , <b>2013</b> , 30, 3111	1.7	48
60	Ultracompact vanadium dioxide dual-mode plasmonic waveguide electroabsorption modulator. <i>Nanophotonics</i> , <b>2013</b> , 2, 13-19	6.3	35
59	Inverse bremsstrahlung in relativistic quantum plasmas. <i>Physical Review E</i> , <b>2013</b> , 87, 063112	2.4	5
58	Motion-induced radiation from electrons moving in Maxwell's fish-eye. <i>Scientific Reports</i> , <b>2013</b> , 3, 3065	4.9	5
57	Analysis of nonuniform field emission from a sharp tip emitter of Lorentzian or hyperboloid shape. <i>Journal of Applied Physics</i> , <b>2013</b> , 113, 144902	2.5	13



56	Onset of space charge limited current for field emission from a single sharp tip. <i>Physics of Plasmas</i> , <b>2012</b> , 19, 033107	2.1	21
55	Vandium dioxide active plasmonics <b>2012</b> ,		1
54	Ultrafast laser-induced electron emission from multiphoton to optical tunneling. <i>Physical Review B</i> , <b>2012</b> , 86,	3.3	24
53	Plasmonic coupled-cavity system for enhancement of surface plasmon localization in plasmonic detectors. <i>Nanotechnology</i> , <b>2012</b> , 23, 275201	3.4	6
52	Ang Replies:. <i>Physical Review Letters</i> , <b>2012</b> , 109,	7.4	4
51	Klein tunnelling model of low energy electron field emission from single-layer graphene sheet. <i>Applied Physics Letters</i> , <b>2011</b> , 99, 013112	3.4	29
50	Design of a monopole-antenna-based resonant nanocavity for detection of optical power from hybrid plasmonic waveguides. <i>Optics Express</i> , <b>2011</b> , 19, 17075-85	3.3	20
49	Analytical re-derivation of space charge limited current in solids using capacitor model. <i>Journal of Applied Physics</i> , <b>2011</b> , 110, 094514	2.5	9
48	Child–Langmuir law in the Coulomb blockade regime. <i>Applied Physics Letters</i> , <b>2011</b> , 98, 051502	3.4	33
47	Two-dimensional electromagnetic Child–Langmuir law of a short-pulse electron flow. <i>Physics of Plasmas</i> , <b>2011</b> , 18, 023105	2.1	11
46	Shot noise reduction of space charge limited electron injection through a Schottky contact for a GaN diode. <i>Physical Review B</i> , <b>2010</b> , 81,	3.3	3
45	Space charge limited current in a gap combined of free space and solid. <i>Applied Physics Letters</i> , <b>2010</b> , 96, 183501	3.4	11
44	A Compact Model for Undoped Silicon-Nanowire MOSFETs With Schottky-Barrier Source/Drain. <i>IEEE Transactions on Electron Devices</i> , <b>2009</b> , 56, 1100-1109	2.9	26
43	Two-dimensional model of space charge limited electron injection into a diode with Schottky contact. <i>Journal Physics D: Applied Physics</i> , <b>2009</b> , 42, 055504	3	15
42	Quantum model of space-charge-limited field emission in a nanogap. <i>Nanotechnology</i> , <b>2008</b> , 19, 235402	3.4	23
41	A compact model for undoped symmetric double-gate MOSFETs with Schottky-barrier source/drain <b>2008</b> ,		8
40	Nonequilibrium model of ultrafast laser-induced electron photofield emission from a dc-biased metallic surface. <i>Physical Review B</i> , <b>2008</b> , 78,	3.3	35
39	Multi-purpose ionization gas sensing devices using carbon nanofibers on plastic substrates. <i>Diamond and Related Materials</i> , <b>2008</b> , 17, 1959-1962	3.5	5

38	Field emission from a single carbon nanofiber at sub 100nm gap. <i>Applied Physics Letters</i> , <b>2008</b> , 93, 023133	3.4	21
37	Theory of shot noise in high-current space-charge-limited field emission. <i>Physical Review B</i> , <b>2008</b> , 77, 075406	3.3	7
36	Low temperature refrigeration by using thermal-field electron emission in a coaxial cylindrical diode. <i>Journal of Applied Physics</i> , <b>2008</b> , 104, 084506	2.5	2
35	Short-pulse space-charge-limited electron flows in a drift space. <i>Physics of Plasmas</i> , <b>2008</b> , 15, 063105	2.1	5
34	A rigorous surface-potential-based I-V model for undoped cylindrical nanowire MOSFETs		6
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