

Richard A Hogg

List of Publications by Year in descending order

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278
papers

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all docs

281
docs citations

281
times ranked

2298
citing authors

#	ARTICLE	IF	CITATIONS
1	Long-wavelength InAs/GaAs quantum-dot laser diode monolithically grown on Ge substrate. Nature Photonics, 2011, 5, 416-419.	31.4	344
2	Detection of single photons using a field-effect transistor gated by a layer of quantum dots. Applied Physics Letters, 2000, 76, 3673-3675.	3.3	142
3	High-performance three-layer 1.3- μm InAs-GaAs quantum-dot lasers with very low continuous-wave room-temperature threshold currents. IEEE Photonics Technology Letters, 2005, 17, 1139-1141.	2.5	136
4	Structural and optical properties of type II GaSb/GaAs self-assembled quantum dots grown by molecular beam epitaxy. Journal of Applied Physics, 1999, 85, 8349-8352.	2.5	128
5	Long-wavelength light emission and lasing from InAs-GaAs quantum dots covered by a GaAsSb strain-reducing layer. Applied Physics Letters, 2005, 86, 143108.	3.3	120
6	Self-assembled quantum-dot superluminescent light-emitting diodes. Advances in Optics and Photonics, 2010, 2, 201.	25.5	93
7	p-doped 1.3- μm InAs-GaAs quantum-dot laser with a low threshold current density and high differential efficiency. Applied Physics Letters, 2006, 89, 073113.	3.3	87
8	Photoluminescence, photoluminescence excitation, and resonant Raman spectroscopy of disordered and ordered Ga _{0.52} In _{0.48} P. Journal of Applied Physics, 1993, 73, 5163-5172.	2.5	81
9	Tailoring of internal fields in InGaAs/GaAs multiwell structures grown on (111)B GaAs. Applied Physics Letters, 1993, 63, 752-754.	3.3	77
10	Systematic Study of the Effects of Modulation p-Doping on 1.3- μm Quantum-Dot Lasers. IEEE Journal of Quantum Electronics, 2007, 43, 1129-1139.	1.9	65
11	1.55 μm InAs/GaAs Quantum Dots and High Repetition Rate Quantum Dot SESAM Mode-locked Laser. Scientific Reports, 2012, 2, 477.	3.3	65
12	Near-infrared and mid-infrared semiconductor broadband light emitters. Light: Science and Applications, 2018, 7, 17170-17170.	16.6	62
13	Broad-band superluminescent light-emitting diodes incorporating quantum dots in compositionally modulated quantum wells. IEEE Photonics Technology Letters, 2006, 18, 58-60.	2.5	60
14	Piezoelectric-field effects on transition energies, oscillator strengths, and level widths in (111)B-grown (In,Ga)As/GaAs multiple quantum wells. Physical Review B, 1993, 48, 8491-8494.	3.2	49
15	Band gap of ϵ -completely disordered ϵ^{TM} Ga _{0.52} In _{0.48} P. Applied Physics Letters, 1995, 66, 3185-3187.	3.3	48
16	Quantum Dot Superluminescent Diodes for Optical Coherence Tomography: Device Engineering. IEEE Journal of Selected Topics in Quantum Electronics, 2010, 16, 1015-1022.	2.9	46
17	Sensitivity Advantage of QCL Tunable-Laser Mid-Infrared Spectroscopy Over FTIR Spectroscopy. Applied Spectroscopy Reviews, 2015, 50, 822-839.	6.7	46
18	Density Control of GaSb/GaAs Self-assembled Quantum Dots (\sim 25nm) Grown by Molecular Beam Epitaxy. Japanese Journal of Applied Physics, 1998, 37, L203-L205.	1.5	44

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19	Single Photon Detection with a Quantum Dot Transistor. Japanese Journal of Applied Physics, 2001, 40, 2058-2064.	1.5	43
20	Realization of extremely broadband quantum-dot superluminescent light-emitting diodes by rapid thermal-annealing process. Optics Letters, 2008, 33, 1210.	3.3	43
21	Rapid radiative decay of charged excitons. Physical Review B, 2000, 62, R13294-R13297.	3.2	39
22	Direct modulation of excited state quantum dot lasers. Applied Physics Letters, 2009, 95, .	3.3	39
23	Epitaxially Regrown GaAs-Based Photonic Crystal Surface-Emitting Laser. IEEE Photonics Technology Letters, 2012, 24, 966-968.	2.5	38
24	Optical spectroscopy of self-assembled type II GaSb/GaAs quantum dot structures grown by molecular beam epitaxy. Applied Physics Letters, 1998, 72, 2856-2858.	3.3	35
25	The effect of growth temperature of GaAs nucleation layer on InAs/GaAs quantum dots monolithically grown on Ge substrates. Applied Physics Letters, 2012, 100, .	3.3	34
26	Valence-band splitting in orderedGa _{0.5} In _{0.5} P measured by polarized photoluminescence excitation spectroscopy. Physical Review B, 1992, 46, 7232-7235.	3.2	33
27	Photoluminescence excitation spectroscopy of GaAs:Er,O in the near-band-edge region. Journal of Applied Physics, 1996, 79, 8682-8687.	2.5	32
28	Quantum Dot Superluminescent Diodes for Optical Coherence Tomography: Skin Imaging. IEEE Journal of Selected Topics in Quantum Electronics, 2010, 16, 748-754.	2.9	31
29	Broad-Band Superluminescent Light Emitting Diodes Incorporating Quantum Dots in Compositionally Modulated Quantum Wells. Japanese Journal of Applied Physics, 2006, 45, 2542-2545.	1.5	28
30	Atomic configurations of Er centers in GaAs:Er,O and AlGaAs:Er,O studied by site-selective luminescence spectroscopy. Journal of Applied Physics, 1997, 82, 3997-4005.	2.5	27
31	High-Power Quantum-Dot Superluminescent LED With Broadband Drive Current Insensitive Emission Spectra Using a Tapered Active Region. IEEE Photonics Technology Letters, 2008, 20, 782-784.	2.5	27
32	Electroluminescence recombination from excited-state carrier populations in double-barrier resonant-tunneling structures. Physical Review B, 1992, 45, 13757-13760.	3.2	26
33	Quantum dot selective area intermixing for broadband light sources. Optics Express, 2012, 20, 26950.	3.4	26
34	Tuning Superluminescent Diode Characteristics for Optical Coherence Tomography Systems by Utilizing a Multicontact Device Incorporating Wavelength-Modulated Quantum Dots. IEEE Journal of Selected Topics in Quantum Electronics, 2009, 15, 757-763.	2.9	25
35	A p-type-doped quantum dot superluminescent LED with broadband and flat-topped emission spectra obtained by post-growth intermixing under a GaAs proximity cap. Nanotechnology, 2009, 20, 055204.	2.6	23
36	Persistent template effect in InAs/GaAs quantum dot bilayers. Journal of Applied Physics, 2010, 107, .	2.5	23

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37	Ultra-broad spontaneous emission and modal gain spectrum from a hybrid quantum well/quantum dot laser structure. Applied Physics Letters, 2012, 100, .	3.3	23
38	Hybrid Quantum Well/Quantum Dot Structure for Broad Spectral Bandwidth Emitters. IEEE Journal of Selected Topics in Quantum Electronics, 2013, 19, 1900209-1900209.	2.9	23
39	A diode-pumped 1.5 μ m waveguide laser mode-locked at 6.8 GHz by a quantum dot SESAM. Laser Physics Letters, 2013, 10, 105803.	1.4	23
40	Electronic control of coherence in a two-dimensional array of photonic crystal surface emitting lasers. Scientific Reports, 2015, 5, 13203.	3.3	23
41	Superluminescent diode with a broadband gain based on self-assembled InAs quantum dots and segmented contacts for an optical coherence tomography light source. Journal of Applied Physics, 2016, 119, 083107.	2.5	23
42	Comparison of spontaneous and piezoelectric polarization in GaN/Al _{0.65} Ga _{0.35} N multi-quantum-well structures. Applied Physics Letters, 2000, 76, 1428-1430.	3.3	22
43	Effect of facet angle on effective facet reflectivity and operating characteristics of quantum dot edge emitting lasers and superluminescent light-emitting diodes. Applied Physics Letters, 2007, 91, 081112.	3.3	22
44	Effects of intermixing on modulation p-doped quantum dot superluminescent light emitting diodes. Optics Express, 2010, 18, 7055.	3.4	22
45	All-Semiconductor Photonic Crystal Surface-Emitting Lasers Based on Epitaxial Regrowth. IEEE Journal of Selected Topics in Quantum Electronics, 2013, 19, 4900407-4900407.	2.9	21
46	Near-infrared superluminescent diode using stacked self-assembled InAs quantum dots with controlled emission wavelengths. Japanese Journal of Applied Physics, 2014, 53, 04EG10.	1.5	21
47	A Dual-Pass High Current Density Resonant Tunneling Diode for Terahertz Wave Applications. IEEE Electron Device Letters, 2015, 36, 1295-1298.	3.9	21
48	GaAs-Based Superluminescent Light-Emitting Diodes with 290-nm Emission Bandwidth by Using Hybrid Quantum Well/Quantum Dot Structures. Nanoscale Research Letters, 2015, 10, 1049.	5.7	21
49	Gallium Nitride Superluminescent Light Emitting Diodes for Optical Coherence Tomography Applications. IEEE Journal of Selected Topics in Quantum Electronics, 2017, 23, 1-11.	2.9	21
50	Cu ₂ O-Based Electrochemical Biosensor for Non-Invasive and Portable Glucose Detection. Biosensors, 2022, 12, 174.	4.7	20
51	Excitation power and barrier width dependence of photoluminescence in piezoelectric multi-quantum well structures. Applied Physics Letters, 1996, 68, 820-822.	3.3	19
52	Enhanced nonradiative Auger recombination in p-type modulation doped InAs/GaAs quantum dots. Applied Physics Letters, 2008, 93, .	3.3	19
53	Design, growth, fabrication, and characterization of InAs/GaAs 1.3 μ m quantum dot broadband superluminescent light emitting diode. Journal of Applied Physics, 2006, 100, 103105.	2.5	18
54	Enhanced room-temperature quantum-dot effects in modulation-doped InAs/GaAs quantum dots. Applied Physics Letters, 2009, 95, 171902.	3.3	18

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55	Integration of Emission-Wavelength-Controlled InAs Quantum Dots for Ultra-Broadband Near-Infrared Light Source. <i>Nanomaterials and Nanotechnology</i> , 2014, 4, 26.	3.0	18
56	Carrier screening effects in piezoelectric strained InGaAs/GaAs quantum wells grown on the [111]Baxis. <i>Journal of Applied Physics</i> , 1994, 76, 5447-5452.	2.5	17
57	Multi-section quantum dot superluminescent diodes for spectral shape engineering. <i>IET Optoelectronics</i> , 2009, 3, 100-104.	3.3	17
58	1.5 μ m Epitaxially Regrown Photonic Crystal Surface Emitting Laser Diode. <i>IEEE Photonics Technology Letters</i> , 2020, 32, 1531-1534.	2.5	17
59	Optical and thermal characteristics of narrow-ridge quantum-cascade lasers. <i>Journal of Applied Physics</i> , 2008, 103, 083113.	2.5	16
60	Low-Dimensional Waveguide Grating Fabrication in GaN with Use of SiCl ₄ /Cl ₂ /Ar-Based Inductively Coupled Plasma Dry Etching. <i>Journal of Electronic Materials</i> , 2009, 38, 635-639.	2.2	16
61	Toward 1550-nm GaAs-Based Lasers Using InAs/GaAs Quantum Dot Bilayers. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2011, 17, 1334-1342.	2.9	16
62	Imaging of spectral-domain optical coherence tomography using a superluminescent diode based on InAs quantum dots emitting broadband spectrum with Gaussian-like shape. <i>Japanese Journal of Applied Physics</i> , 2015, 54, 04DG07.	1.5	16
63	Coherently Coupled Photonic-Crystal Surface-Emitting Laser Array. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2015, 21, 493-499.	2.9	16
64	Growth of pseudomorphic InGaAs/GaAs quantum wells on [111]B GaAs for strained layer, piezoelectric, optoelectronic devices. <i>Microelectronics Journal</i> , 1995, 26, 811-820.	2.0	15
65	Growth, Fabrication, and Operating Characteristics of Ultra-Low Threshold Current Density 1.3 μ m Quantum Dot Lasers. <i>Japanese Journal of Applied Physics</i> , 2005, 44, 2520-2522.	1.5	15
66	High-Power and Broadband Quantum Dot Superluminescent Diodes Centered at 1250 nm for Optical Coherence Tomography. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2007, 13, 1267-1272.	2.9	15
67	High performance intermixed p-doped quantum dot superluminescent diodes at 1.2 μ m. <i>Electronics Letters</i> , 2010, 46, 295.	1.0	15
68	Negative differential gain due to many body effects in self-assembled quantum dot lasers. <i>Applied Physics Letters</i> , 2011, 99, 061104.	3.3	15
69	Monolithically grown multi-color InAs quantum dots as a spectral-shape-controllable near-infrared broadband light source. <i>Applied Physics Letters</i> , 2013, 103, .	3.3	15
70	Non-destructive mapping of doping and structural composition of MOVPE-grown high current density resonant tunnelling diodes through photoluminescence spectroscopy. <i>Journal of Crystal Growth</i> , 2015, 418, 102-110.	1.5	15
71	Development of a broadband superluminescent diode based on self-assembled InAs quantum dots and demonstration of high-axial-resolution optical coherence tomography imaging. <i>Journal Physics D: Applied Physics</i> , 2019, 52, 225105.	2.8	15
72	GaAs-based self-aligned laser incorporating InGaP opto-electronic confinement layer. <i>Electronics Letters</i> , 2008, 44, 905.	1.0	13

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73	Maximising performance of optical coherence tomography systems using a multi-section chirped quantum dot superluminescent diode. <i>Microelectronics Journal</i> , 2009, 40, 588-591.	2.0	13
74	Swept-Source Laser Based on Quantum-Dot Semiconductor Optical Amplifier Applications in Optical Coherence Tomography. <i>IEEE Photonics Technology Letters</i> , 2011, 23, 739-741.	2.5	13
75	Band structure and waveguide modelling of epitaxially regrown photonic crystal surface-emitting lasers. <i>Journal Physics D: Applied Physics</i> , 2013, 46, 264005.	2.8	13
76	Epitaxial Designs for Maximizing Efficiency in Resonant Tunneling Diode Based Terahertz Emitters. <i>IEEE Journal of Quantum Electronics</i> , 2018, 54, 1-11.	1.9	13
77	Modeling and Device Simulation of Photonic Crystal Surface Emitting Lasers Based on Modal Index Analysis. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2019, 25, 1-9.	2.9	13
78	High performance InP-based quantum cascade distributed feedback lasers with deeply etched lateral gratings. <i>Applied Physics Letters</i> , 2006, 89, 201117.	3.3	12
79	All semiconductor swept laser source utilizing quantum dots. <i>Applied Physics Letters</i> , 2007, 91, 121119.	3.3	12
80	Zero and Controllable Linewidth Enhancement Factor in p-Doped 1.3 μm Quantum Dot Lasers. <i>Japanese Journal of Applied Physics</i> , 2007, 46, 2421-2423.	1.5	12
81	Simultaneous three-state lasing in quantum dot laser at room temperature. <i>Electronics Letters</i> , 2010, 46, 1155.	1.0	12
82	Room temperature simultaneous three-state lasing in hybrid quantum well/quantum dot laser. <i>Electronics Letters</i> , 2012, 48, 644.	1.0	12
83	10 ⁶ GHz pulse repetition rate Er:Yb:glass laser modelocked with quantum dot semiconductor saturable absorber mirror. <i>Applied Optics</i> , 2016, 55, 3776.	2.1	12
84	Optimisation of photonic crystal coupling through waveguide design. <i>Optical and Quantum Electronics</i> , 2017, 49, 47.	3.3	12
85	Effect of rapid thermal annealing on threading dislocation density in III-V epilayers monolithically grown on silicon. <i>Journal of Applied Physics</i> , 2018, 123, .	2.5	12
86	Er-related trap levels in GaAs:Er,O studied by optical spectroscopy under hydrostatic pressure. <i>Physical Review B</i> , 1997, 56, 10255-10263.	3.2	11
87	Fabrication of v-groove gratings in InP by inductively coupled plasma etching with SiCl ₄ /Ar. <i>Semiconductor Science and Technology</i> , 2006, 21, L1-L5.	2.0	11
88	Tradeoffs in the Realization of Electrically Pumped Vertical External Cavity Surface Emitting Lasers. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2011, 17, 1745-1752.	2.9	11
89	O-band excited state quantum dot bilayer lasers. <i>Applied Physics Letters</i> , 2011, 99, 051101.	3.3	11
90	Active glass waveguide amplifier on GaAs by UV-pulsed laser deposition and femtosecond laser inscription. <i>Laser Physics Letters</i> , 2012, 9, 329-339.	1.4	11

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91	Extending emission wavelength of InAs/GaAs quantum dots beyond 1.3 μ m by using quantum dot bi-layer for broadband light source. Journal of Crystal Growth, 2013, 378, 553-557.	1.5	11
92	Valley current characterization of high current density resonant tunnelling diodes for terahertz-wave applications. AIP Advances, 2017, 7, .	1.3	11
93	Broadband THz absorption spectrometer based on excitonic nonlinear optical effects. Light: Science and Applications, 2019, 8, 29.	16.6	11
94	Void engineering in epitaxially regrown GaAs-based photonic crystal surface emitting lasers by grating profile design. Applied Physics Letters, 2021, 118, .	3.3	11
95	Growth and characterization of (111)B InGaAs/GaAs multi-quantum well PIN diode structures. Journal of Electronic Materials, 1994, 23, 975-982.	2.2	10
96	Carrier dynamics and recombination processes of charged excitons in a GaAs/AlGaAs quantum well. Physica B: Condensed Matter, 1999, 272, 412-415.	2.7	10
97	Formation and Recombination Dynamics of Charged Excitons in a GaAs Quantum Well. Physica Status Solidi (B): Basic Research, 2001, 227, 297-306.	1.5	10
98	Tunable interband and intersubband transitions in modulation C-doped InGaAs δ -GaAs quantum dot lasers by postgrowth annealing process. Applied Physics Letters, 2008, 93, 071111.	3.3	10
99	In-Plane Optical Anisotropy of GaN Refractive Index in Visible Light Region. IEEE Photonics Technology Letters, 2009, 21, 966-968.	2.5	10
100	High Repetition Rate Ti:Sapphire Laser Mode-Locked by InP Quantum-Dot Saturable Absorber. IEEE Photonics Technology Letters, 2011, 23, 1603-1605.	2.5	10
101	Multi-color quantum dot ensembles grown in selective-areas for shape-controlled broadband light source. Journal of Crystal Growth, 2011, 323, 191-193.	1.5	10
102	Optimization of Quantum-Dot Molecular Beam Epitaxy for Broad Spectral Bandwidth Devices. IEEE Photonics Journal, 2012, 4, 2066-2073.	2.0	10
103	Preferential alignment of Er ²⁺ O centers in GaAs:Er,O revealed by anisotropic host δ -excited photoluminescence. Applied Physics Letters, 1996, 68, 3317-3319.	3.3	9
104	Improved temperature performance of 1.31- μ m quantum dot lasers by optimized ridge waveguide design. IEEE Photonics Technology Letters, 2005, 17, 1785-1787.	2.5	9
105	High-Power 1.3- μ m Quantum-Dot Superluminescent Light-Emitting Diode Grown by Molecular Beam Epitaxy. IEEE Photonics Technology Letters, 2007, 19, 109-111.	2.5	9
106	Gallium nitride light sources for optical coherence tomography. , 2017, , .		9
107	Coherent power scaling in photonic crystal surface emitting laser arrays. AIP Advances, 2021, 11, .	1.3	9
108	Effect of Deposition Temperature on the Opto-Electronic Properties of Molecular Beam Epitaxy Grown InAs Quantum Dot Devices for Broadband Applications. Japanese Journal of Applied Physics, 2012, 51, 02BG09.	1.5	9

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109	Common path Michelson interferometer based on multiple reflections within the sample arm: sensor applications and imaging artefacts. Measurement Science and Technology, 2011, 22, 027002.	2.6	8
110	Optical characterization of In-flushed InAs/GaAs quantum dots emitting a broadband spectrum with multiple peaks at $\sim 1.3\ \mu\text{m}$. Nanoscale Research Letters, 2015, 10, 231.	5.7	8
111	Mode Control in Photonic Crystal Surface Emitting Lasers Through External Reflection. IEEE Journal of Selected Topics in Quantum Electronics, 2017, 23, 1-8.	2.9	8
112	Resonant exciton excitation photoluminescence and dynamics in a GaAs/AlAs multiple quantum well with internal electric field. AIP Advances, 2020, 10, .	1.3	8
113	Electrically Driven Near-Infrared Broadband Light Source with Gaussian-Like Spectral Shape Based on Multiple InAs Quantum Dots. IEICE Transactions on Electronics, 2016, E99.C, 381-384.	0.6	8
114	Spectroscopic study of piezo-electric field effects in InGaAs/GaAs multi-quantum wells grown on (111)B oriented GaAs substrates. Solid-State Electronics, 1994, 37, 645-648.	1.4	7
115	Pressure-induced intra-4f luminescence in GaAs:Er,O. Applied Physics Letters, 1997, 71, 93-95.	3.3	7
116	Molecular Beam Epitaxial Growth of High Power Quantum Dot Super-Luminescent Diodes. Japanese Journal of Applied Physics, 2007, 46, 2418-2420.	1.5	7
117	Temperature dependence of Ga-assisted oxide desorption on GaAs(001). Journal of Physics: Conference Series, 2010, 209, 012066.	0.4	7
118	Study of annealed InAs/GaAs quantum dot structures. Journal of Physics: Conference Series, 2010, 209, 012036.	0.4	7
119	Optimisation of Coupling between Photonic Crystal and Active Elements in an Epitaxially Regrown GaAs Based Photonic Crystal Surface Emitting Laser. Japanese Journal of Applied Physics, 2012, 51, 02BG05.	1.5	7
120	Observation of Wannier-Stark ladder transitions in $\text{In}_x\text{Ga}_{1-x}\text{As}$ -GaAs piezoelectric superlattices. Physical Review B, 1995, 52, R14340-R14343.	3.2	6
121	Energy-Transfer Processes in Oxygen-Codoped GaAs:Er. Materials Research Society Symposia Proceedings, 1996, 422, 267.	0.1	6
122	High performance $1.3\ \mu\text{m}$ InAs/GaAs quantum dot lasers with low threshold current and negative characteristic temperature. , 2006, 6184, 374.		6
123	Broadband quantum dot superluminescent LED with angled facet formed by focused ion beam etching. Electronics Letters, 2007, 43, 587.	1.0	6
124	Analysis of $1.2\ \mu\text{m}$ InGaAs/GaAs quantum dot laser for high power applications. Journal of Applied Physics, 2009, 106, 073102.	2.5	6
125	Quantum Well and Dot Self-Aligned Stripe Lasers Utilizing an InGaP Optoelectronic Confinement Layer. IEEE Journal of Selected Topics in Quantum Electronics, 2009, 15, 819-827.	2.9	6
126	Distributed feedback laser employing buried GaAs/InGaP index-coupled grating. Electronics Letters, 2010, 46, 1076.	1.0	6

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127	Simulations of nanograting-assisted light coupling in GaN planar waveguide. Optical and Quantum Electronics, 2011, 42, 619-629.	3.3	6
128	Common path Fourier domain optical coherence tomography based on multiple reflections within the sample arm. Optics Communications, 2011, 284, 3168-3172.	2.1	6
129	Optimisation of Coupling between Photonic Crystal and Active Elements in an Epitaxially Regrown GaAs Based Photonic Crystal Surface Emitting Laser. Japanese Journal of Applied Physics, 2012, 51, 02BG05.	1.5	6
130	Broadband Light Source Based on Four-Color Self-Assembled InAs Quantum Dot Ensembles Monolithically Grown in Selective Areas. IEICE Transactions on Electronics, 2012, E95-C, 247-250.	0.6	6
131	Growth of quantum three-dimensional structure of InGaAs emitting at $\sim 1 \mu\text{m}$ applicable for a broadband near-infrared light source. Journal of Crystal Growth, 2017, 477, 230-234.	1.5	6
132	Wide Frequency Tuning of Continuous Terahertz Wave Generated by Difference Frequency Mixing under Exciton-Excitation Conditions in a GaAs Multiple Quantum Well. Optics Communications, 2017, 320, 1-6.	3.8	6
133	Optical spectroscopic study of electric field sharing effects in piezoelectric GaN/Al _{0.65} Ga _{0.35} N multi-quantum well structures. Physica E: Low-Dimensional Systems and Nanostructures, 2000, 7, 924-928.	2.7	5
134	High-performance 1300-nm InAs/GaAs quantum-dot lasers. , 2008, , .		5
135	Subthreshold diode characteristics of InAs/GaAs quantum dot lasers. Physical Review B, 2011, 83, .	3.2	5
136	Effect of Deposition Temperature on the Opto-Electronic Properties of Molecular Beam Epitaxy Grown InAs Quantum Dot Devices for Broadband Applications. Japanese Journal of Applied Physics, 2012, 51, 02BG09.	1.5	5
137	A PHOTOMIXER DRIVEN TERAHERTZ DIPOLE ANTENNA WITH HIGH INPUT RESISTANCE AND GAIN. Progress in Electromagnetics Research M, 2015, 44, 13-20.	0.9	5
138	Photoluminescence Characterisation of High Current Density Resonant Tunnelling Diodes for Terahertz Applications. IEICE Transactions on Electronics, 2016, E99.C, 181-188.	0.6	5
139	Dominant role of many-body effects on the carrier distribution function of quantum dot lasers. Applied Physics Express, 2016, 9, 032705.	2.4	5
140	Strain Balancing of Metal-Organic Vapour Phase Epitaxy InAs/GaAs Quantum Dot Lasers. IEEE Journal of Selected Topics in Quantum Electronics, 2017, 23, 1-8.	2.9	5
141	Proposal for Common Active $1.3 \mu\text{m}$ Quantum Dot Electroabsorption Modulated DFB Laser. IEEE Photonics Technology Letters, 2019, 31, 419-422.	2.5	5
142	Comparative analysis of void-containing and all-semiconductor $1.5 \mu\text{m}$ InP-based photonic crystal surface-emitting laser diodes. AIP Advances, 2021, 11, .	1.3	5
143	Tunable external cavity laser diode based on wavelength controlled self-assembled InAs quantum dots for swept-source optical coherence tomography applications at 1100 nm wavelength band. , 2019, , .		5
144	Inductively coupled plasma etching of GaN using SiCl ₄ /Cl ₂ /Ar for submicron-sized features fabrication. Physica Status Solidi C: Current Topics in Solid State Physics, 2007, 4, 2634-2637.	0.8	4

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145	Bilayer for extending the wavelength of QD lasers. Journal of Physics: Conference Series, 2010, 245, 012083.	0.4	4
146	1.52µm electroluminescence from GaAs-based quantum dot bilayers. Electronics Letters, 2011, 47, 44.	1.0	4
147	GaAs-based superluminescent diodes with window-like facet structure for low spectral modulation at high output powers. Semiconductor Science and Technology, 2016, 31, 045003.	2.0	4
148	Characterisation of high current density resonant tunneling diodes for THz emission using photoluminescence spectroscopy. Proceedings of SPIE, 2016, , .	0.8	4
149	Non-destructive characterization of thin layer resonant tunneling diodes. Journal of Applied Physics, 2019, 126, .	2.5	4
150	Increase in terahertz-wave generation by difference frequency mixing by the overlap of exciton states in different GaAs/AlAs quantum wells and spectroscopic measurements. Optics Express, 2021, 29, 24387.	3.4	4
151	Evaluating resonances in PCSEL structures based on modal indices. IET Optoelectronics, 2019, 13, 17-22.	3.3	4
152	Configurational transformation of an Er center in GaAs:Er,O under hydrostatic pressure. Journal of Applied Physics, 1997, 82, 813-816.	2.5	3
153	Effect of GaAs polycrystal on the size and areal density of InAs quantum dots in selective area molecular beam epitaxy. Journal of Crystal Growth, 2006, 297, 38-43.	1.5	3
154	Ga assisted oxide desorption on GaAs(001) studied by scanning tunnelling microscopy. Journal of Crystal Growth, 2010, 312, 1687-1692.	1.5	3
155	Strain engineered bilayers for extending the operating wavelength of quantum dot lasers. IET Optoelectronics, 2011, 5, 100-104.	3.3	3
156	Design Rules and Characterisation of Electrically Pumped Vertical External Cavity Surface Emitting Lasers. Japanese Journal of Applied Physics, 2011, 50, 04DG05.	1.5	3
157	Gain spectrum measurement using the segmented contact method with an integrated optical amplifier. Journal of Applied Physics, 2014, 115, 163105.	2.5	3
158	Monte Carlo model incorporating many-body effects for determining the gain spectra of quantum dot lasers. Applied Physics Express, 2015, 8, 122102.	2.4	3
159	High input resistance terahertz dipole antenna with an isolating photonic band gap layer. , 2016, , .		3
160	Bandwidth enhancement in an InGaN/GaN three-section superluminescent diode for optical coherence tomography. Applied Physics Letters, 2020, 117, .	3.3	3
161	1.1µm waveband tunable laser using emission-wavelength-controlled InAs quantum dots for swept-source optical coherence tomography applications. Japanese Journal of Applied Physics, 2021, 60, SBBE02.	1.5	3
162	Photoluminescence excitation spectroscopy for structural and electronic characterization of resonant tunneling diodes for THz applications. AIP Advances, 2021, 11, 035122.	1.3	3

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163	Fitting of photoluminescence spectra for structural characterisation of high current density resonant tunnelling diodes for THz applications. , 2021, , .		3
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