

Nicolas Grandjean

List of Publications by Citations

Source: <https://exaly.com/author-pdf/8909606/nicolas-grandjean-publications-by-citations.pdf>

Version: 2024-04-23

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

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

533
papers

15,450
citations

62
h-index

98
g-index

566
ext. papers

16,633
ext. citations

3
avg, IF

6.19
L-index

#	Paper	IF	Citations
533	Room-temperature polariton lasing in semiconductor microcavities. <i>Physical Review Letters</i> , 2007 , 98, 126405	7.4	710
532	Temperature quenching of photoluminescence intensities in undoped and doped GaN. <i>Journal of Applied Physics</i> , 1999 , 86, 3721-3728	2.5	418
531	Quantum confined Stark effect due to built-in internal polarization fields in (Al,Ga)N/GaN quantum wells. <i>Physical Review B</i> , 1998 , 58, R13371-R13374	3.3	362
530	Current status of AlInN layers lattice-matched to GaN for photonics and electronics. <i>Journal Physics D: Applied Physics</i> , 2007 , 40, 6328-6344	3	278
529	From visible to white light emission by GaN quantum dots on Si(111) substrate. <i>Applied Physics Letters</i> , 1999 , 75, 962-964	3.4	254
528	High electron mobility lattice-matched AlInN/GaN field-effect transistor heterostructures. <i>Applied Physics Letters</i> , 2006 , 89, 062106	3.4	253
527	Room temperature polariton lasing in a GaN/AlGaIn multiple quantum well microcavity. <i>Applied Physics Letters</i> , 2008 , 93, 051102	3.4	232
526	Built-in electric-field effects in wurtzite AlGaIn/GaN quantum wells. <i>Journal of Applied Physics</i> , 1999 , 86, 3714-3720	2.5	223
525	High internal electric field in a graded-width InGaIn/GaN quantum well: Accurate determination by time-resolved photoluminescence spectroscopy. <i>Applied Physics Letters</i> , 2001 , 78, 1252-1254	3.4	194
524	Nitridation of sapphire. Effect on the optical properties of GaN epitaxial overlayers. <i>Applied Physics Letters</i> , 1996 , 69, 2071-2073	3.4	170
523	Barrier-width dependence of group-III nitrides quantum-well transition energies. <i>Physical Review B</i> , 1999 , 60, 1496-1499	3.3	168
522	Spontaneous polarization buildup in a room-temperature polariton laser. <i>Physical Review Letters</i> , 2008 , 101, 136409	7.4	163
521	Two-dimensional electron gas density in Al _{1-x} In _x N/AlN/GaN heterostructures (0.03 ≤ x ≤ 0.23). <i>Journal of Applied Physics</i> , 2008 , 103, 093714	2.5	138
520	Epitaxial growth of highly strained In _x Ga _{1-x} As on GaAs(001): the role of surface diffusion length. <i>Journal of Crystal Growth</i> , 1993 , 134, 51-62	1.6	133
519	Molecular Beam Epitaxy of Group-III Nitrides on Silicon Substrates: Growth, Properties and Device Applications. <i>Physica Status Solidi A</i> , 2001 , 188, 501-510		131
518	Delayed relaxation by surfactant action in highly strained III-V semiconductor epitaxial layers. <i>Physical Review Letters</i> , 1992 , 69, 796-799	7.4	129
517	Progresses in III-nitride distributed Bragg reflectors and microcavities using AlInN/GaN materials. <i>Physica Status Solidi (B): Basic Research</i> , 2005 , 242, 2326-2344	1.3	124

516	Time-resolved photoluminescence as a probe of internal electric fields in GaN-(GaAl)N quantum wells. <i>Physical Review B</i> , 1999 , 59, 15363-15367	3.3	120
515	Oscillation of the lattice relaxation in layer-by-layer epitaxial growth of highly strained materials. <i>Physical Review Letters</i> , 1993 , 71, 1411-1414	7.4	116
514	High-electron-mobility AlGa _x N/GaN heterostructures grown on Si(111) by molecular-beam epitaxy. <i>Applied Physics Letters</i> , 2001 , 78, 335-337	3.4	115
513	Composition of Wide Bandgap Semiconductor Materials and Nanostructures Measured by Atom Probe Tomography and Its Dependence on the Surface Electric Field. <i>Journal of Physical Chemistry C</i> , 2014 , 118, 24136-24151	3.8	114
512	205-GHz (Al,In)N/GaN HEMTs. <i>IEEE Electron Device Letters</i> , 2010 , 31, 957-959	4.4	111
511	Efficiency of NH ₃ as nitrogen source for GaN molecular beam epitaxy. <i>Applied Physics Letters</i> , 1998 , 72, 350-352	3.4	111
510	Blue monolithic AlInN-based vertical cavity surface emitting laser diode on free-standing GaN substrate. <i>Applied Physics Letters</i> , 2012 , 101, 151113	3.4	109
509	Room-temperature blue-green emission from InGa _x N/GaN quantum dots made by strain-induced islanding growth. <i>Applied Physics Letters</i> , 1999 , 75, 3751-3753	3.4	105
508	High electron mobility in AlGa _x N/GaN heterostructures grown on bulk GaN substrates. <i>Applied Physics Letters</i> , 2000 , 77, 2551-2553	3.4	103
507	Radiative lifetime of a single electron-hole pair in GaN/AlN quantum dots. <i>Physical Review B</i> , 2006 , 73,	3.3	101
506	GaN and Al _x Ga _{1-x} N molecular beam epitaxy monitored by reflection high-energy electron diffraction. <i>Applied Physics Letters</i> , 1997 , 71, 1816-1818	3.4	100
505	Monolithic White Light Emitting Diodes Based on InGa _x N/GaN Multiple-Quantum Wells. <i>Japanese Journal of Applied Physics</i> , 2001 , 40, L918-L920	1.4	100
504	Crack-free fully epitaxial nitride microcavity using highly reflective AlInN/GaN Bragg mirrors. <i>Applied Physics Letters</i> , 2005 , 86, 031107	3.4	98
503	Luminescence and reflectivity studies of undoped, n- and p-doped GaN on (0001) sapphire. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 1997 , 50, 97-104	3.1	97
502	Barrier-Layer Scaling of InAlN/GaN HEMTs. <i>IEEE Electron Device Letters</i> , 2008 , 29, 422-425	4.4	95
501	Testing the Temperature Limits of GaN-Based HEMT Devices. <i>IEEE Transactions on Device and Materials Reliability</i> , 2010 , 10, 427-436	1.6	92
500	GaN evaporation in molecular-beam epitaxy environment. <i>Applied Physics Letters</i> , 1999 , 74, 1854-1856	3.4	90
499	Surfactant effect on the surface diffusion length in epitaxial growth. <i>Physical Review B</i> , 1993 , 48, 8502-8505	3.5	89

498	Analysis of degradation mechanisms in lattice-matched InAlN/GaN high-electron-mobility transistors. <i>Journal of Applied Physics</i> , 2009 , 106, 124503	2.5	84
497	Molecular-beam epitaxy of gallium nitride on (0001) sapphire substrates using ammonia. <i>Journal of Applied Physics</i> , 1998 , 83, 1379-1383	2.5	83
496	Can InAlN/GaN be an alternative to high power / high temperature AlGaIn/GaN devices? 2006 ,		82
495	Polariton lasing in a hybrid bulk ZnO microcavity. <i>Applied Physics Letters</i> , 2011 , 99, 161104	3.4	81
494	Condensation phase diagram of cavity polaritons in GaN-based microcavities: Experiment and theory. <i>Physical Review B</i> , 2010 , 81,	3.3	80
493	Recent Progress in the Growth of Highly Reflective Nitride-Based Distributed Bragg Reflectors and Their Use in Microcavities. <i>Japanese Journal of Applied Physics</i> , 2005 , 44, 7207-7216	1.4	79
492	Midinfrared intersubband absorption in lattice-matched AlInN/GaN multiple quantum wells. <i>Applied Physics Letters</i> , 2005 , 87, 111106	3.4	78
491	Self-limitation of AlGaIn/GaN quantum well energy by built-in polarization field. <i>Applied Physics Letters</i> , 1999 , 74, 2361-2363	3.4	78
490	Gas source molecular beam epitaxy of wurtzite GaN on sapphire substrates using GaN buffer layers. <i>Applied Physics Letters</i> , 1997 , 71, 240-242	3.4	76
489	Technology and Performance of InAlN/AlN/GaN HEMTs With Gate Insulation and Current Collapse Suppression Using ZrO_2 or HfO_2 . <i>IEEE Transactions on Electron Devices</i> , 2008 , 55, 937-941	2.9	76
488	Thermal stability of GaN investigated by Raman scattering. <i>Applied Physics Letters</i> , 1998 , 73, 960-962	3.4	74
487	Real time control of In _x Ga _{1-x} N molecular beam epitaxy growth. <i>Applied Physics Letters</i> , 1998 , 72, 1078-1080	3.4	74
486	Crack-free highly reflective AlInN/AlGaIn Bragg mirrors for UV applications. <i>Applied Physics Letters</i> , 2006 , 88, 051108	3.4	73
485	Recombination coefficients of GaN-based laser diodes. <i>Journal of Applied Physics</i> , 2011 , 109, 093106	2.5	72
484	Burying non-radiative defects in InGaIn underlayer to increase InGaIn/GaN quantum well efficiency. <i>Applied Physics Letters</i> , 2017 , 111, 262101	3.4	71
483	Large vacuum Rabi splitting in a multiple quantum well GaN-based microcavity in the strong-coupling regime. <i>Physical Review B</i> , 2008 , 77,	3.3	71
482	Surfactant mediated epitaxial growth of In _x Ga _{1-x} As on GaAs (001). <i>Applied Physics Letters</i> , 1992 , 61, 99-101	3.4	71
481	Room-temperature polariton luminescence from a bulk GaN microcavity. <i>Physical Review B</i> , 2006 , 73,	3.3	70

480	High spatial resolution picosecond cathodoluminescence of InGaN quantum wells. <i>Applied Physics Letters</i> , 2006 , 89, 232109	3.4	70
479	InGaN/GaN quantum wells grown by molecular-beam epitaxy emitting from blue to red at 300 K. <i>Applied Physics Letters</i> , 2000 , 77, 1268-1270	3.4	70
478	InGaN based micro light emitting diodes featuring a buried GaN tunnel junction. <i>Applied Physics Letters</i> , 2015 , 107, 051107	3.4	67
477	Exciton localization on basal stacking faults in a-plane epitaxial lateral overgrown GaN grown by hydride vapor phase epitaxy. <i>Journal of Applied Physics</i> , 2009 , 105, 043102	2.5	65
476	GaN surface as the source of non-radiative defects in InGaN/GaN quantum wells. <i>Applied Physics Letters</i> , 2018 , 113, 111106	3.4	65
475	Impact of disorder on high quality factor III-V nitride microcavities. <i>Applied Physics Letters</i> , 2006 , 89, 261101	3.4	64
474	Piezoelectric field and its influence on the pressure behavior of the light emission from GaN/AlGaIn strained quantum wells. <i>Applied Physics Letters</i> , 2001 , 79, 1483-1485	3.4	64
473	Broadband blue superluminescent light-emitting diodes based on GaN. <i>Applied Physics Letters</i> , 2009 , 95, 081107	3.4	62
472	Large size dependence of exciton-longitudinal-optical-phonon coupling in nitride-based quantum wells and quantum boxes. <i>Applied Physics Letters</i> , 2002 , 80, 428-430	3.4	62
471	Complex behavior of biexcitons in GaN quantum dots due to a giant built-in polarization field. <i>Physical Review B</i> , 2008 , 77,	3.3	61
470	Polarity inversion of GaN(0001) by a high Mg doping. <i>Journal of Crystal Growth</i> , 2004 , 269, 249-256	1.6	61
469	Influence of pressure on the optical properties of In _x Ga _{1-x} N epilayers and quantum structures. <i>Physical Review B</i> , 2001 , 64,	3.3	61
468	. <i>IEEE Electron Device Letters</i> , 2011 , 32, 1364-1366	4.4	60
467	Gate insulation and drain current saturation mechanism in InAlN/GaN metal-oxide-semiconductor high-electron-mobility transistors. <i>Applied Physics Letters</i> , 2007 , 91, 043509	3.4	59
466	InAlN/GaN HEMTs for Operation in the 1000 °C Regime: A First Experiment. <i>IEEE Electron Device Letters</i> , 2012 , 33, 985-987	4.4	58
465	Surface segregation in (Ga,In)As/GaAs quantum boxes. <i>Physical Review B</i> , 1997 , 55, R10189-R10192	3.3	56
464	Role of stable and metastable Mg complexes in p-type GaN for cw blue laser diodes. <i>Applied Physics Letters</i> , 2011 , 98, 213505	3.4	55
463	Group-III nitride quantum heterostructures grown by molecular beam epitaxy. <i>Journal of Physics Condensed Matter</i> , 2001 , 13, 6945-6960	1.8	55

462	Epitaxial relationships between GaN and Al ₂ O ₃ (0001) substrates. <i>Applied Physics Letters</i> , 1997 , 70, 643-645	54
461	MOCVD of HfO ₂ and ZrO ₂ high-k gate dielectrics for InAlN/AlN/GaN MOS-HEMTs. <i>Semiconductor Science and Technology</i> , 2007 , 22, 1272-1275	1.8 54
460	GaN grown on Si(111) substrate: From two-dimensional growth to quantum well assessment. <i>Applied Physics Letters</i> , 1999 , 75, 82-84	3-4 53
459	Effects of strain and composition on the lattice parameters and applicability of Vegard's rule in Al-rich Al _{1-x} In _x N films grown on sapphire. <i>Journal of Applied Physics</i> , 2008 , 103, 103513	2-5 52
458	Monte Carlo simulation of In surface segregation during the growth of In _x Ga _{1-x} As on GaAs(001). <i>Physical Review B</i> , 1996 , 53, 998-1001	3-3 52
457	Strain compensation in AlInN/GaN multilayers on GaN substrates: Application to the realization of defect-free Bragg reflectors. <i>Applied Physics Letters</i> , 2011 , 98, 181111	3-4 51
456	High quality factor two dimensional GaN photonic crystal cavity membranes grown on silicon substrate. <i>Applied Physics Letters</i> , 2012 , 100, 071103	3-4 50
455	High quality nitride based microdisks obtained via selective wet etching of AlInN sacrificial layers. <i>Applied Physics Letters</i> , 2008 , 92, 171102	3-4 50
454	Effects of GaAlN barriers and of dimensionality on optical recombination processes in InGaN quantum wells and quantum boxes. <i>Applied Physics Letters</i> , 2001 , 78, 1538-1540	3-4 50
453	Intrinsic degradation mechanism of nearly lattice-matched InAlN layers grown on GaN substrates. <i>Journal of Applied Physics</i> , 2013 , 113, 063506	2-5 49
452	Ultraviolet GaN light-emitting diodes grown by molecular beam epitaxy using NH ₃ . <i>Applied Physics Letters</i> , 1998 , 72, 82-84	3-4 49
451	Ultrathin InAlN/AlN Barrier HEMT With High Performance in Normally Off Operation. <i>IEEE Electron Device Letters</i> , 2009 , 30, 1030-1032	4-4 48
450	InAlN/GaN MOSHEMT With Self-Aligned Thermally Generated Oxide Recess. <i>IEEE Electron Device Letters</i> , 2009 , 30, 1131-1133	4-4 48
449	Indium surfactant effect on AlInN/GaN heterostructures grown by metal-organic vapor-phase epitaxy: Applications to intersubband transitions. <i>Applied Physics Letters</i> , 2006 , 88, 151902	3-4 48
448	Observation and modeling of the time-dependent descreening of internal electric field in a wurtzite GaN/Al _{0.15} Ga _{0.85} N quantum well after high photoexcitation. <i>Physical Review B</i> , 2004 , 69,	3-3 48
447	In surface segregation in InGaN/GaN quantum wells. <i>Journal of Crystal Growth</i> , 2003 , 251, 471-475	1-6 48
446	Intraband absorptions in GaN/AlN quantum dots in the wavelength range of 1.27-1.4 μ m. <i>Applied Physics Letters</i> , 2003 , 82, 868-870	3-4 48
445	Status of the Emerging InAlN/GaN Power HEMT Technology. <i>Open Electrical and Electronic Engineering Journal</i> , 2008 , 2, 1-7	0 48

444	Integrated photonics on silicon with wide bandgap GaN semiconductor. <i>Applied Physics Letters</i> , 2013 , 102, 081120	3-4	47
443	Blue lasing at room temperature in high quality factor GaN/AlN microdisks with InGaN quantum wells. <i>Applied Physics Letters</i> , 2007 , 90, 061106	3-4	47
442	Acoustic phonon scattering of two-dimensional electrons in GaN/AlGaN heterostructures. <i>Applied Physics Letters</i> , 2002 , 80, 1228-1230	3-4	46
441	Critical impact of Ehrlich-Schwabel barrier on GaN surface morphology during homoepitaxial growth. <i>Journal of Crystal Growth</i> , 2016 , 433, 36-42	1.6	45
440	Diamond overgrown InAlN/GaN HEMT. <i>Diamond and Related Materials</i> , 2011 , 20, 604-608	3-5	45
439	AlGaIn/GaN HEMT on (111) single crystalline diamond. <i>Electronics Letters</i> , 2010 , 46, 299	1.1	45
438	Blue lasing at room temperature in an optically pumped lattice-matched AlInN/GaN VCSEL structure. <i>Electronics Letters</i> , 2007 , 43, 924	1.1	45
437	Molecular Beam Epitaxy of GaN under N-rich Conditions using NH ₃ . <i>Japanese Journal of Applied Physics</i> , 1999 , 38, 618-621	1.4	45
436	Continuous wave blue lasing in III-nitride nanobeam cavity on silicon. <i>Nano Letters</i> , 2015 , 15, 1259-63	11.5	44
435	Impact of inhomogeneous excitonic broadening on the strong exciton-photon coupling in quantum well nitride microcavities. <i>Physical Review B</i> , 2006 , 73,	3-3	44
434	Two-color GaN/AlGaIn quantum cascade detector at short infrared wavelengths of 1 and 1.7 μ m. <i>Applied Physics Letters</i> , 2012 , 100, 181103	3-4	43
433	High-Al-content crack-free AlGaIn/GaN Bragg mirrors grown by molecular-beam epitaxy. <i>Applied Physics Letters</i> , 2003 , 82, 499-501	3-4	43
432	Photoreflectance investigations of the bowing parameter in AlGaIn alloys lattice-matched to GaN. <i>Applied Physics Letters</i> , 1999 , 74, 3353-3355	3-4	43
431	102-GHz AlInN/GaN HEMTs on Silicon With 2.5-W/mm Output Power at 10 GHz. <i>IEEE Electron Device Letters</i> , 2009 , 30, 796-798	4-4	42
430	Lattice-matched distributed Bragg reflectors for nitride-based vertical cavity surface emitting lasers. <i>Electronics Letters</i> , 2005 , 41, 94	1.1	42
429	Statistical correction of atom probe tomography data of semiconductor alloys combined with optical spectroscopy: The case of Al _{0.25} Ga _{0.75} N. <i>Journal of Applied Physics</i> , 2016 , 119, 105704	2-5	42
428	High doping level in Mg-doped GaN layers grown at low temperature. <i>Journal of Applied Physics</i> , 2008 , 103, 013110	2.5	41
427	Injection Dependence of the Electroluminescence Spectra of Phosphor Free GaN-Based White Light Emitting Diodes. <i>Physica Status Solidi A</i> , 2002 , 192, 139-143		41

426	GaN epitaxial growth on sapphire (0 0 0 1): the role of the substrate nitridation. <i>Journal of Crystal Growth</i> , 1997 , 178, 220-228	1.6	40
425	Inhomogeneous broadening of Al _x Ga _{1-x} N/GaN quantum wells. <i>Physical Review B</i> , 2005 , 71,	3.3	40
424	Low-temperature time-resolved cathodoluminescence study of exciton dynamics involving basal stacking faults in a-plane GaN. <i>Applied Physics Letters</i> , 2009 , 94, 201115	3.4	39
423	Gate-lag and drain-lag effects in (GaN)/InAlN/GaN and InAlN/AlN/GaN HEMTs. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2007 , 204, 2019-2022	1.6	39
422	Photoluminescence energy and linewidth in GaN/AlN stackings of quantum dot planes. <i>Journal of Applied Physics</i> , 2004 , 96, 180-185	2.5	39
421	Optical properties of GaN epilayers and GaN/AlGaIn quantum wells grown by molecular beam epitaxy on GaN(0001) single crystal substrate. <i>Journal of Applied Physics</i> , 2000 , 88, 183-187	2.5	39
420	GaN/AlGaIn multiple-quantum-well light-emitting diodes grown by molecular beam epitaxy. <i>Applied Physics Letters</i> , 1999 , 74, 3616-3618	3.4	39
419	A quantum optical study of thresholdless lasing features in high-nitride nanobeam cavities. <i>Nature Communications</i> , 2018 , 9, 564	17.4	38
418	Time dependence of the photoluminescence of GaN/AlN quantum dots under high photoexcitation. <i>Physical Review B</i> , 2003 , 68,	3.3	38
417	M-Plane GaN/InAlN Multiple Quantum Wells in Core-Shell Wire Structure for UV Emission. <i>ACS Photonics</i> , 2014 , 1, 38-46	6.3	37
416	94-GHz Large-Signal Operation of AlInN/GaN High-Electron-Mobility Transistors on Silicon With Regrown Ohmic Contacts. <i>IEEE Electron Device Letters</i> , 2015 , 36, 17-19	4.4	37
415	Thermally induced voltage shift in capacitance-voltage characteristics and its relation to oxide/semiconductor interface states in Ni/Al ₂ O ₃ /InAlN/GaN heterostructures. <i>Semiconductor Science and Technology</i> , 2009 , 24, 035008	1.8	37
414	Temperature Dependence of Optical Properties of h-GaN Films Studied by Reflectivity and Ellipsometry. <i>Japanese Journal of Applied Physics</i> , 2000 , 39, 20-25	1.4	37
413	Mg doping for p-type AlInN lattice-matched to GaN. <i>Applied Physics Letters</i> , 2012 , 101, 082113	3.4	36
412	Enhancement of Auger recombination induced by carrier localization in InGaIn/GaN quantum wells. <i>Physical Review B</i> , 2017 , 95,	3.3	35
411	Visible InGaIn/GaN Quantum-Dot Materials and Devices. <i>Proceedings of the IEEE</i> , 2007 , 95, 1853-1865	14.3	35
410	Near infrared absorption and room temperature photovoltaic response in AlInGaIn superlattices grown by metal-organic vapor-phase epitaxy. <i>Applied Physics Letters</i> , 2006 , 89, 041106	3.4	35
409	Comparison of the In distribution in InGaIn/GaN quantum well structures grown by molecular beam epitaxy and metalorganic vapor phase epitaxy. <i>Journal of Crystal Growth</i> , 2004 , 262, 145-150	1.6	35

408	Control of the polarity of GaN films using an Mg adsorption layer. <i>Journal of Crystal Growth</i> , 2003 , 251, 460-464	1.6	35
407	Surfactant-mediated molecular-beam epitaxy of III \bar{V} strained-layer heterostructures. <i>Journal of Crystal Growth</i> , 1995 , 150, 460-466	1.6	35
406	Exciton dynamics at a single dislocation in GaN probed by picosecond time-resolved cathodoluminescence. <i>Applied Physics Letters</i> , 2016 , 109, 042101	3.4	35
405	Carrier-density-dependent recombination dynamics of excitons and electron-hole plasma in m-plane InGaN/GaN quantum wells. <i>Physical Review B</i> , 2016 , 94,	3.3	34
404	Microroughness and exciton localization in (Al,Ga)As/GaAs quantum wells. <i>Physical Review B</i> , 1997 , 55, 5253-5258	3.3	34
403	Small-signal characteristics of AlInN/GaN HEMTs. <i>Electronics Letters</i> , 2006 , 42, 779	1.1	34
402	Observation of long-lived oblique excitons in GaN-AlGa \bar{N} multiple quantum wells. <i>Physical Review B</i> , 1999 , 59, 10246-10250	3.3	34
401	Hot-Electron-Related Degradation in InAlN/GaN High-Electron-Mobility Transistors. <i>IEEE Transactions on Electron Devices</i> , 2014 , 61, 2793-2801	2.9	33
400	Ultrahigh-Speed AlInN/GaN High Electron Mobility Transistors Grown on (111) High-Resistivity Silicon with FT= 143 GHz. <i>Applied Physics Express</i> , 2010 , 3, 094101	2.4	33
399	Study of the epitaxial relationships between III-nitrides and M-plane sapphire. <i>Journal of Applied Physics</i> , 2010 , 108, 113521	2.5	33
398	Optical study of segregation effects on the electronic properties of molecular-beam-epitaxy grown (In,Ga)As/GaAs quantum wells. <i>Physical Review B</i> , 1997 , 55, 2406-2412	3.3	33
397	Influence of high Mg doping on the microstructural and optoelectronic properties of GaN. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2002 , 93, 224-228	3.1	33
396	Comprehensive description of the dynamical screening of the internal electric fields of AlGa \bar{N} /GaN quantum wells in time-resolved photoluminescence experiments. <i>Journal of Applied Physics</i> , 2003 , 93, 400-409	2.5	33
395	GaN/AlGa \bar{N} quantum wells for UV emission: heteroepitaxy versus homoepitaxy. <i>Semiconductor Science and Technology</i> , 2001 , 16, 358-361	1.8	33
394	GaN/Al \bar{x} Ga $_{1-x}$ N quantum wells grown by molecular beam epitaxy with thickness control at the monolayer scale. <i>Applied Physics Letters</i> , 1998 , 73, 1260-1262	3.4	33
393	High-temperature Mott transition in wide-band-gap semiconductor quantum wells. <i>Physical Review B</i> , 2014 , 90,	3.3	32
392	Strain-induced interface instability in GaN/AlN multiple quantum wells. <i>Applied Physics Letters</i> , 2007 , 91, 061927	3.4	32
391	Scale Effects on Exciton Localization and Nonradiative Processes in GaN/AlGa \bar{N} Quantum Wells. <i>Physica Status Solidi A</i> , 2000 , 180, 127-132		32

390	AlN grown on Si(1 1 1) by ammonia-molecular beam epitaxy in the 900–200 °C temperature range. <i>Journal of Crystal Growth</i> , 2017 , 476, 58-63	1.6	31
389	Engineering the Lateral Optical Guiding in Gallium Nitride-Based Vertical-Cavity Surface-Emitting Laser Cavities to Reach the Lowest Threshold Gain. <i>Japanese Journal of Applied Physics</i> , 2013 , 52, 08JG04	1.4	30
388	High Power Blue-Violet Superluminescent Light Emitting Diodes with InGaN Quantum Wells. <i>Applied Physics Express</i> , 2010 , 3, 061002	2.4	30
387	Exciton recombination dynamics in a-plane (Al,Ga)N/GaN quantum wells probed by picosecond photo and cathodoluminescence. <i>Journal of Applied Physics</i> , 2010 , 107, 043524	2.5	30
386	In situ imaging of threading dislocation terminations at the surface of GaN(0001) epitaxially grown on Si(111). <i>Physical Review B</i> , 2000 , 61, 7618-7621	3.3	30
385	Surface kinetics of GaN evaporation and growth by molecular-beam epitaxy. <i>Surface Science</i> , 2000 , 450, 191-203	1.8	30
384	Phase diagram of a polariton laser from cryogenic to room temperature. <i>Physical Review B</i> , 2009 , 80,	3.3	29
383	Elastic misfit stress relaxation in highly strained InGaAs/GaAs structures. <i>Applied Physics Letters</i> , 1994 , 65, 1162-1164	3.4	29
382	Nano-scale luminescence characterization of individual InGaN/GaN quantum wells stacked in a microcavity using scanning transmission electron microscope cathodoluminescence. <i>Applied Physics Letters</i> , 2014 , 105, 032101	3.4	28
381	Analysis of structurally sensitive loss in GaN-based VCSEL cavities and its effect on modal discrimination. <i>Optics Express</i> , 2014 , 22, 411-26	3.3	28
380	Current transport and barrier height evaluation in Ni/InAlN/GaN Schottky diodes. <i>Applied Physics Letters</i> , 2010 , 96, 223501	3.4	28
379	RF Performance of InAlN/GaN HFETs and MOSHFETs With f_T times L_G up to 21 GHz·μm. <i>IEEE Electron Device Letters</i> , 2010 , 31, 180-182	4.4	28
378	Al _{0.83} In _{0.17} N lattice-matched to GaN used as an optical blocking layer in GaN-based edge emitting lasers. <i>Applied Physics Letters</i> , 2009 , 94, 193506	3.4	28
377	Structural Defects and Relation with Optoelectronic Properties in Highly Mg-Doped GaN. <i>Physica Status Solidi A</i> , 2002 , 192, 394-400		28
376	Inelastic Light Scattering by Phonons in Hexagonal GaN/AlN Nanostructures. <i>Physica Status Solidi A</i> , 2001 , 183, 157-161		28
375	Optical investigations in (In,Ga)As/GaAs quantum wells grown by metalorganic molecular-beam epitaxy. <i>Physical Review B</i> , 1995 , 51, 13274-13280	3.3	28
374	Efficient continuous-wave nonlinear frequency conversion in high-Q gallium nitride photonic crystal cavities on silicon. <i>APL Photonics</i> , 2017 , 2, 031301	5.2	27
373	. <i>IEEE Electron Device Letters</i> , 2013 , 34, 432-434	4.4	27

372	Pinning and depinning of the polarization of exciton-polariton condensates at room temperature. <i>Physical Review Letters</i> , 2010 , 104, 166402	7.4	27
371	Stranski-Krastanov GaN/AlN quantum dots grown by metal organic vapor phase epitaxy. <i>Journal of Applied Physics</i> , 2006 , 99, 083509	2.5	27
370	MBE growth of AlGaIn/GaN HEMTs on resistive Si(1 1 1) substrate with RF small signal and power performances. <i>Journal of Crystal Growth</i> , 2003 , 251, 811-815	1.6	27
369	Optical investigation of micrometer and nanometer-size individual GaN pillars fabricated by reactive ion etching. <i>Journal of Applied Physics</i> , 2002 , 91, 6520	2.5	27
368	GaN and GaInN quantum dots: an efficient way to get luminescence in the visible spectrum range. <i>Applied Surface Science</i> , 2000 , 164, 241-245	6.7	27
367	Leakage mechanisms in InAlN based heterostructures. <i>Journal of Applied Physics</i> , 2014 , 115, 074506	2.5	26
366	Anomalous composition dependence of the band gap pressure coefficients in In-containing nitride semiconductors. <i>Physical Review B</i> , 2010 , 81,	3.3	26
365	Electrical properties of InAlN/GaN high electron mobility transistor with Al ₂ O ₃ , ZrO ₂ , and GdScO ₃ gate dielectrics. <i>Journal of Vacuum Science and Technology B: Nanotechnology and Microelectronics</i> , 2011 , 29, 01A808	1.3	26
364	Intrinsic dynamics of weakly and strongly confined excitons in nonpolar nitride-based heterostructures. <i>Physical Review B</i> , 2011 , 83,	3.3	26
363	Polarization field mapping of Al _{0.85} In _{0.15} N/AlN/GaN heterostructure. <i>Applied Physics Letters</i> , 2009 , 94, 121909	3.4	26
362	Proposal and Performance Analysis of Normally Off n^+ GaN/InAlN/AlN/GaN HEMTs With 1-nm-Thick InAlN Barrier. <i>IEEE Transactions on Electron Devices</i> , 2010 , 57, 2144-2154	2.9	26
361	Efficient current injection scheme for nitride vertical cavity surface emitting lasers. <i>Applied Physics Letters</i> , 2007 , 90, 033514	3.4	26
360	High quality thin GaN templates grown by hydride vapor phase epitaxy on sapphire substrates. <i>Applied Physics Letters</i> , 2006 , 88, 241914	3.4	26
359	Room temperature polariton luminescence from a GaN/AlGaIn quantum well microcavity. <i>Applied Physics Letters</i> , 2006 , 89, 071107	3.4	26
358	Real-time investigation of In surface segregation in chemical beam epitaxy of In _{0.5} Ga _{0.5} P on GaAs (001). <i>Applied Physics Letters</i> , 1996 , 68, 3579-3581	3.4	26
357	Improvement of the growth of In _x Ga _{1-x} As on GaAs (001) using Te as surfactant. <i>Applied Physics Letters</i> , 1993 , 63, 66-68	3.4	26
356	InGaIn laser diode with metal-free laser ridge using n ⁺ -GaIn contact layers. <i>Applied Physics Express</i> , 2016 , 9, 061004	2.4	26
355	Submicron metal-semiconductor-metal ultraviolet detectors based on AlGaIn grown on silicon: Results and simulation. <i>Journal of Applied Physics</i> , 2002 , 92, 5602-5604	2.5	25

354	Toward Bright and Pure Single Photon Emitters at 300 K Based on GaN Quantum Dots on Silicon. <i>ACS Photonics</i> , 2020 , 7, 1515-1522	6.3	24
353	AlInN-Based HEMTs for Large-Signal Operation at 40 GHz. <i>IEEE Transactions on Electron Devices</i> , 2013 , 60, 3091-3098	2.9	24
352	Gallium nitride L3 photonic crystal cavities with an average quality factor of 16 900 in the near infrared. <i>Applied Physics Letters</i> , 2014 , 105, 231119	3.4	24
351	Submicron periodic poling and chemical patterning of GaN. <i>Applied Physics Letters</i> , 2005 , 87, 062106	3.4	24
350	Selective oxidation of AlInN layers for current confinement in IIIbNitride devices. <i>Applied Physics Letters</i> , 2005 , 87, 072102	3.4	24
349	Backward diodes using heavily Mg-doped GaN growth by ammonia molecular-beam epitaxy. <i>Applied Physics Letters</i> , 2016 , 108, 072102	3.4	24
348	InAlN underlayer for near ultraviolet InGaN based light emitting diodes. <i>Applied Physics Express</i> , 2019 , 12, 034002	2.4	23
347	Critical thickness of GaN on AlN: impact of growth temperature and dislocation density. <i>Semiconductor Science and Technology</i> , 2017 , 32, 075010	1.8	23
346	100-nm-Gate (Al,In)N/GaN HEMTs Grown on SiC With $f_{T} = 144$ GHz. <i>IEEE Electron Device Letters</i> , 2010 , 31, 293-295	4.4	23
345	Near-infrared characterization of gallium nitride photonic-crystal waveguides and cavities. <i>Optics Letters</i> , 2012 , 37, 4588-90	3	23
344	Combining diamond electrodes with GaN heterostructures for harsh environment ISFETs. <i>Diamond and Related Materials</i> , 2009 , 18, 884-889	3.5	23
343	Coupled longitudinal optic phonon-plasmon modes in p-type GaN. <i>Solid State Communications</i> , 1998 , 106, 491-494	1.6	23
342	A novel class of coherent light emitters: polariton lasers. <i>Semiconductor Science and Technology</i> , 2011 , 26, 014030	1.8	22
341	Stress-modulated composition in the vicinity of dislocations in nearly lattice matched Al _x In _{1-x} N/GaN heterostructures: A possible explanation of defect insensitivity. <i>Physical Review B</i> , 2011 , 83,	3.3	22
340	Blue laser diodes including lattice-matched Al _{0.83} In _{0.17} N bottom cladding layer. <i>Electronics Letters</i> , 2008 , 44, 521	1.1	22
339	Optical and structural characterization of self-organized stacked GaN/AlN quantum dots. <i>Journal of Physics Condensed Matter</i> , 2004 , 16, S115-S126	1.8	22
338	Signature of GaN/AlN quantum dots by nonresonant Raman scattering. <i>Applied Physics Letters</i> , 2000 , 77, 2174-2176	3.4	22
337	Optical absorption edge broadening in thick InGaN layers: Random alloy atomic disorder and growth mode induced fluctuations. <i>Applied Physics Letters</i> , 2018 , 112, 032106	3.4	21

336	Ultrathin Body InAlN/GaN HEMTs for High-Temperature (600 $^{\circ}$ C) Electronics. <i>IEEE Electron Device Letters</i> , 2013 , 34, 496-498	4.4	21
335	Optical, structural, and morphological characterisation of epitaxial ZnO films grown by pulsed-laser deposition. <i>Thin Solid Films</i> , 2013 , 539, 55-59	2.2	21
334	Self-aligned normally-off metaloxide semiconductor n++GaN/InAlN/GaN high electron mobility transistors. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2015 , 212, 1086-1090	1.6	21
333	Sputtering of (001)AlN thin films: Control of polarity by a seed layer. <i>Journal of Vacuum Science and Technology B: Nanotechnology and Microelectronics</i> , 2010 , 28, L61-L63	1.3	21
332	Self heating in AlInN/AlN/GaN high power devices: Origin and impact on contact breakdown and IV characteristics. <i>Journal of Applied Physics</i> , 2011 , 109, 063720	2.5	21
331	Lattice-Matched GaN/AlN Waveguides at $\lambda=1.55 \mu\text{m}$ Grown by MetalOrganic Vapor Phase Epitaxy. <i>IEEE Photonics Technology Letters</i> , 2008 , 20, 102-104	2.2	21
330	a-plane GaN grown on r-plane sapphire substrates by hydride vapor phase epitaxy. <i>Journal of Crystal Growth</i> , 2007 , 300, 186-189	1.6	21
329	Narrow UV emission from homogeneous GaN/AlGaIn quantum wells. <i>Applied Physics Letters</i> , 2007 , 90, 021905	3.4	21
328	Multilayer (Al,Ga)N structures for solar-blind detection. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2004 , 10, 752-758	3.8	21
327	Extremely sharp dependence of the exciton oscillator strength on quantum-well width in the GaN/AlxGa1-xN system: The polarization field effect. <i>Physical Review B</i> , 2001 , 64,	3.3	21
326	GaN grown on (111) single crystal diamond substrate by molecular beam epitaxy. <i>Journal of Crystal Growth</i> , 2009 , 311, 4539-4542	1.6	20
325	On the origin of basal stacking faults in nonpolar wurtzite films epitaxially grown on sapphire substrates. <i>Journal of Applied Physics</i> , 2012 , 112, 113518	2.5	20
324	Stress control in GaN/sapphire templates for the fabrication of crack-free thick layers. <i>Journal of Crystal Growth</i> , 2006 , 289, 445-449	1.6	20
323	Direct signature of strained GaN quantum dots by Raman scattering. <i>Applied Physics Letters</i> , 2001 , 79, 686-688	3.4	20
322	Dynamics of Excitons in GaN/AlGaIn MQWs with Varying Depths, Thicknesses and Barrier Widths. <i>Physica Status Solidi (B): Basic Research</i> , 1999 , 216, 361-364	1.3	20
321	Extension of the layer-by-layer growth regime of InxGa1-xAs on GaAs (001). <i>Semiconductor Science and Technology</i> , 1993 , 8, 2031-2034	1.8	20
320	Propagating Polaritons in III-Nitride Slab Waveguides. <i>Physical Review Applied</i> , 2017 , 7,	4.3	19
319	Generic picture of the emission properties of III-nitride polariton laser diodes: Steady state and current modulation response. <i>Physical Review B</i> , 2012 , 86,	3.3	19

318	A simplified GaN/AlGa _N quantum cascade detector with an alloy extractor. <i>Applied Physics Letters</i> , 2012 , 101, 251101	3.4	19
317	Different pressure behavior of GaN/AlGa _N quantum structures grown along polar and nonpolar crystallographic directions. <i>Journal of Applied Physics</i> , 2009 , 105, 063104	2.5	19
316	Room temperature polariton lasing in III-nitride microcavities: a comparison with blue GaN-based vertical cavity surface emitting lasers 2009 ,		19
315	Built-in electric field and large Stokes shift in near-lattice-matched GaN/AlInN quantum wells. <i>Applied Physics Letters</i> , 2008 , 92, 201901	3.4	19
314	Spin and interaction effects in Shubnikov-de Haas oscillations and the quantum Hall effect in GaN/AlGa _N heterostructures. <i>Journal of Physics Condensed Matter</i> , 2004 , 16, 3421-3432	1.8	19
313	Photoluminescence spectroscopy on annealed molecular beam epitaxy grown GaN. <i>Journal of Applied Physics</i> , 2001 , 89, 1070-1074	2.5	19
312	Modelling of thermally detected optical absorption and luminescence of (In,Ga)N/GaN heterostructures. <i>Solid State Communications</i> , 2000 , 115, 575-579	1.6	19
311	Violet to Orange Room Temperature Luminescence from GaN Quantum Dots on Si(111) Substrates. <i>Physica Status Solidi (B): Basic Research</i> , 1999 , 216, 451-455	1.3	19
310	Improved GaInAs/GaAs heterostructures by high growth rate molecular beam epitaxy. <i>Applied Physics Letters</i> , 1994 , 64, 2664-2666	3.4	19
309	Statistical nanoscale study of localised radiative transitions in GaN/AlGa _N quantum wells and AlGa _N epitaxial layers. <i>Semiconductor Science and Technology</i> , 2016 , 31, 095009	1.8	18
308	M-Plane GaN Grown on m-Plane Sapphire by Hydride Vapor Phase Epitaxy. <i>Japanese Journal of Applied Physics</i> , 2009 , 48, 020226	1.4	18
307	Optical studies of highly strained InGaAs/GaAs quantum wells grown on vicinal surfaces. <i>Journal of Applied Physics</i> , 1997 , 81, 3281-3289	2.5	18
306	Raman scattering in GaN pillar arrays. <i>Journal of Applied Physics</i> , 2002 , 91, 2866-2869	2.5	18
305	Time-Resolved Spectroscopy of MBE-Grown InGa _N /GaN Self-Formed Quantum Dots. <i>Physica Status Solidi A</i> , 2000 , 180, 375-380		18
304	Current collapse reduction in InAlN/GaN MOS HEMTs by in situ surface pre-treatment and atomic layer deposition of ZrO ₂ high-k gate dielectrics. <i>Electronics Letters</i> , 2009 , 45, 570	1.1	17
303	Effect of fluoride plasma treatment on InAlN/GaN HEMTs. <i>Electronics Letters</i> , 2008 , 44, 696	1.1	17
302	Selective photoluminescence spectroscopy of shallow levels in wide band gap semiconductors. <i>Physica B: Condensed Matter</i> , 2001 , 302-303, 39-53	2.8	17
301	Molecular beam epitaxy growth of nitride materials. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 1999 , 59, 39-46	3.1	17

300	Doubly resonant second-harmonic generation of a vortex beam from a bound state in the continuum. <i>Optica</i> , 2020 , 7, 1126	8.6	17
299	Calcium impurity as a source of non-radiative recombination in (In,Ga)N layers grown by molecular beam epitaxy. <i>Applied Physics Letters</i> , 2016 , 109, 212103	3.4	17
298	Optical absorption and oxygen passivation of surface states in III-nitride photonic devices. <i>Journal of Applied Physics</i> , 2018 , 123, 113103	2.5	16
297	Room-Temperature Transport of Indirect Excitons in (Al,Ga)N/GaN Quantum Wells. <i>Physical Review Applied</i> , 2016 , 6,	4.3	16
296	Explanation of threshold voltage scaling in enhancement-mode InAlN/AlN/GaN metal oxide semiconductor high electron mobility transistors on Si substrates. <i>Thin Solid Films</i> , 2012 , 520, 6230-6232 ^{2.2}		16
295	Impact of saturation on the polariton renormalization in III-nitride based planar microcavities. <i>Physical Review B</i> , 2013 , 88,	3.3	16
294	Transport of dipolar excitons in (Al,Ga)N/GaN quantum wells. <i>Physical Review B</i> , 2015 , 91,	3.3	16
293	Ultrathin InAlN/GaN heterostructures on sapphire for high on/off current ratio high electron mobility transistors. <i>Journal of Applied Physics</i> , 2013 , 113, 214503	2.5	16
292	High-Mobility AlGaIn/GaN Two-Dimensional Electron Gas Heterostructure Grown on (111) Single Crystal Diamond Substrate. <i>Japanese Journal of Applied Physics</i> , 2010 , 49, 061001	1.4	16
291	Low-Noise Microwave Performance of 0.1 μm Gate AlInN/GaN HEMTs on SiC. <i>IEEE Microwave and Wireless Components Letters</i> , 2010 , 20, 453-455	2.6	16
290	Superluminescent light emitting diodes: the best out of two worlds 2012 ,		16
289	Evaluation of AlInN/GaN HEMTs on sapphire substrate in microwave, time and temperature domains. <i>Electronics Letters</i> , 2007 , 43, 309	1.1	16
288	Confined electron states in ultrathin AlAs single quantum wells under pressure. <i>Physical Review B</i> , 1992 , 45, 11846-11853	3.3	16
287	Alloy disorder limited mobility of InGaIn two-dimensional electron gas. <i>Applied Physics Letters</i> , 2018 , 112, 262101	3.4	16
286	Composition Metrology of Ternary Semiconductor Alloys Analyzed by Atom Probe Tomography. <i>Journal of Physical Chemistry C</i> , 2018 , 122, 16704-16714	3.8	16
285	Low temperature p-type doping of (Al)GaIn layers using ammonia molecular beam epitaxy for InGaIn laser diodes. <i>Applied Physics Letters</i> , 2014 , 105, 241103	3.4	15
284	n+-GaIn grown by ammonia molecular beam epitaxy: Application to regrown contacts. <i>Applied Physics Letters</i> , 2014 , 105, 202113	3.4	15
283	GaN-on-insulator technology for high-temperature electronics beyond 400 °C. <i>Semiconductor Science and Technology</i> , 2013 , 28, 074026	1.8	15

282	One-dimensional exciton luminescence induced by extended defects in nonpolar GaN/(Al,Ga)N quantum wells. <i>Semiconductor Science and Technology</i> , 2011 , 26, 025012	1.8	15
281	Indium surface segregation during chemical beam epitaxy of and heterostructures. <i>Journal of Crystal Growth</i> , 1997 , 175-176, 1242-1246	1.6	15
280	About some optical properties of Al _x Ga _{1-x} N /GaN quantum wells grown by molecular beam epitaxy. <i>Superlattices and Microstructures</i> , 2004 , 36, 659-674	2.8	15
279	InGaN heterostructures grown by molecular beam epitaxy. <i>Journal of Crystal Growth</i> , 2001 , 227-228, 466-470	1.6	15
278	Grandjean and Massies reply. <i>Physical Review Letters</i> , 1993 , 70, 1031	7.4	15
277	Advantages and remaining issues of state-of-the-art m-plane freestanding GaN substrates grown by halide vapor phase epitaxy from m-plane InGaN epitaxial growth. <i>Semiconductor Science and Technology</i> , 2012 , 27, 024008	1.8	15
276	Multilayer porous structures of HVPE and MOCVD grown GaN for photonic applications. <i>Superlattices and Microstructures</i> , 2017 , 102, 221-234	2.8	14
275	Effects of InAlN underlayer on deep traps detected in near-UV InGaN/GaN single quantum well light-emitting diodes. <i>Journal of Applied Physics</i> , 2019 , 126, 125708	2.5	14
274	Density control of GaN quantum dots on AlN single crystal. <i>Applied Physics Letters</i> , 2019 , 114, 082101	3.4	14
273	Standard-free composition measurements of Al _x In _{1-x} N by low-loss electron energy loss spectroscopy. <i>Physica Status Solidi - Rapid Research Letters</i> , 2011 , 5, 50-52	2.5	14
272	Exact determination of electrical properties of wurtzite Al _{1-x} In _x N/(AlN)/GaN heterostructures (0.07 ≤ x ≤ 0.21) by means of a detailed charge balance equation. <i>International Journal of Microwave and Wireless Technologies</i> , 2010 , 2, 13-20	0.8	14
271	AlGaIn-Free Blue III-Nitride Laser Diodes Grown on c-Plane GaN Substrates. <i>Applied Physics Express</i> , 2010 , 3, 092102	2.4	14
270	Off-state breakdown in InAlN/AlN/GaN high electron mobility transistors. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2009 , 6, S925-S928		14
269	Biexciton kinetics in GaN quantum wells: Time-resolved and time-integrated photoluminescence measurements. <i>Physical Review B</i> , 2008 , 77,	3.3	14
268	Blue Resonant Cavity Light Emitting Diodes with a High-Al-Content GaN/AlGaIn Distributed Bragg Reflector. <i>Japanese Journal of Applied Physics</i> , 2003 , 42, L1509-L1511	1.4	14
267	The Effects of Localization and of Electric Fields on LO-Phonon-Exciton Coupling in InGaN/GaN Quantum Wells and Quantum Boxes. <i>Physica Status Solidi A</i> , 2002 , 190, 149-154		14
266	Surface morphology of GaN grown by molecular beam epitaxy. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2001 , 82, 56-58	3.1	14
265	Fabrication of GaN photonic crystals for 400 nm wavelength. <i>Microelectronic Engineering</i> , 2001 , 57-58, 843-849	2.5	14

264	Study of light emission from GaN/AlGa _x N quantum wells under power-dependent excitation. <i>Journal of Applied Physics</i> , 2002 , 91, 9622	2.5	14
263	Band edge versus deep luminescence of In _x Ga _{1-x} N layers grown by molecular beam epitaxy. <i>Applied Physics Letters</i> , 1998 , 72, 3190-3192	3.4	14
262	Kinetics of surfactant-mediated epitaxy of III-V semiconductors. <i>Physical Review B</i> , 1996 , 53, R13231-R13234	3.3	14
261	III-nitride photonic cavities. <i>Nanophotonics</i> , 2020 , 9, 569-598	6.3	13
260	Interface States and Trapping Effects in Al ₂ O ₃ - and ZrO ₂ /InAlN/AlN/GaN MetalOxideSemiconductor Heterostructures. <i>Japanese Journal of Applied Physics</i> , 2009 , 48, 090201	1.4	13
259	Tailoring the light-matter coupling in anisotropic microcavities: Redistribution of oscillator strength in strained m-plane GaN/AlGa _x N quantum wells. <i>Physical Review B</i> , 2011 , 84,	3.3	13
258	Impact of biexcitons on the relaxation mechanisms of polaritons in III-nitride based multiple quantum well microcavities. <i>Physical Review B</i> , 2012 , 85,	3.3	13
257	Carrier Dynamics in Group-III Nitride Low-Dimensional Systems: Localization versus Quantum-Confined Stark Effect. <i>Physica Status Solidi (B): Basic Research</i> , 2001 , 228, 65-72	1.3	13
256	High Performance Solar Blind Detectors Based on AlGa _x N Grown by MBE on Si. <i>Physica Status Solidi A</i> , 2001 , 188, 325-328		13
255	Magnetophotoluminescence of GaN/Al _x Ga _{1-x} N quantum wells: Valence band reordering and excitonic binding energies. <i>Physical Review B</i> , 2001 , 63,	3.3	13
254	Strong Carrier Localization in GaInN/GaN Quantum Dots Grown by Molecular Beam Epitaxy. <i>Japanese Journal of Applied Physics</i> , 1999 , 38, L1357-L1359	1.4	13
253	GaN on Si(111): From Growth Optimization to Optical Properties of Quantum Well Structures. <i>Physica Status Solidi (B): Basic Research</i> , 1999 , 216, 101-105	1.3	13
252	Photoluminescence under pressure of ultrathin AlAs layers grown on GaAs vicinal surfaces: A search for lateral confinement effects. <i>Physical Review B</i> , 1993 , 47, 1292-1298	3.3	13
251	Buffer-Related Degradation Aspects of Single and Double-Heterostructure Quantum Well InAlN/GaN High-Electron-Mobility Transistors. <i>Japanese Journal of Applied Physics</i> , 2012 , 51, 054102	1.4	13
250	Cavity-enhanced optical Hall effect in two-dimensional free charge carrier gases detected at terahertz frequencies. <i>Optics Letters</i> , 2015 , 40, 2688-91	3	12
249	Biexcitonic molecules survive excitons at the Mott transition. <i>Nature Communications</i> , 2014 , 5, 5251	17.4	12
248	Thermal stability and in situ SiN passivation of InAlN/GaN high electron mobility heterostructures. <i>Applied Physics Letters</i> , 2014 , 105, 112101	3.4	12
247	Investigation of the In composition in InGa _x N/GaN quantum wells deposited by MOVPE and/or MBE with emission from violet to green. <i>Physica Status Solidi (B): Basic Research</i> , 2011 , 248, 1187-1190	1.3	12

246	Observation of dodecagon-shape V-defects in GaN/AlInN multiple quantum wells. <i>Applied Physics Letters</i> , 2010 , 97, 161902	3-4	12
245	Thermal oxidation of lattice matched InAlN/GaN heterostructures. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2010 , 7, 13-16		12
244	Photoluminescence energy and interface chemistry of GaInP/GaAs quantum wells. <i>Applied Physics Letters</i> , 1997 , 71, 3552-3554	3-4	12
243	GaN based LEDs grown by molecular beam epitaxy. <i>Electronics Letters</i> , 1997 , 33, 2156	1.1	12
242	Selective etching of AlInN/GaN heterostructures for MEMS technology. <i>Microelectronic Engineering</i> , 2007 , 84, 1152-1156	2.5	12
241	Optical Investigations and Absorption Coefficient Determination of InGaN/GaN Quantum Wells. <i>Physica Status Solidi A</i> , 2002 , 190, 135-140		12
240	Internal photoemission in solar blind AlGaIn Schottky barrier photodiodes. <i>Applied Physics Letters</i> , 2005 , 86, 063511	3-4	12
239	Reduction of Carrier In-Plane Mobility in Group-III Nitride Based Quantum Wells: The Role of Internal Electric Fields. <i>Physica Status Solidi A</i> , 2001 , 183, 61-66		12
238	Enhanced luminescence efficiency due to exciton localization in self-assembled InGaIn/GaN quantum dots. <i>Solid State Communications</i> , 2000 , 113, 495-498	1.6	12
237	First demonstration of plasmonic GaN quantum cascade detectors with enhanced efficiency at normal incidence. <i>Optics Express</i> , 2014 , 22, 21069-78	3-3	11
236	Shallow donor and deep DX-like center in InAlN layers nearly lattice-matched to GaN. <i>Physical Review B</i> , 2014 , 90,	3-3	11
235	In-Plane Polarities of Nonpolar Wurtzite Epitaxial Films Deposited on m- and r-plane Sapphire Substrates. <i>Japanese Journal of Applied Physics</i> , 2009 , 48, 090211	1.4	11
234	Homogeneous and inhomogeneous linewidth broadening of single polar GaN/AlN quantum dots. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2009 , 6, S598-S601		11
233	Solar blind detectors based on AlGaIn grown on sapphire. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2005 , 2, 964-971		11
232	Interface Effects on the Photoluminescence of GaAs/GaInP Quantum Wells. <i>Japanese Journal of Applied Physics</i> , 1998 , 37, 15-22	1.4	11
231	Characterization of Near Edge Optical Transitions in Undoped and Doped GaN/Sapphire Grown by MOVPE, HVPE, and GSMBE. <i>Materials Research Society Symposia Proceedings</i> , 1996 , 449, 695		11
230	Growth of Thick GaN Layers by Hydride Vapor Phase Epitaxy on Sapphire Substrate with Internally Focused Laser Processing. <i>Applied Physics Express</i> , 2013 , 6, 035502	2.4	11
229	InGaIn/GaN quantum wells for polariton laser diodes: Role of inhomogeneous broadening. <i>Journal of Applied Physics</i> , 2014 , 115, 233511	2.5	10

228	Thermal carrier emission and nonradiative recombinations in nonpolar (Al,Ga)N/GaN quantum wells grown on bulk GaN. <i>Journal of Applied Physics</i> , 2012 , 111, 033517	2.5	10
227	Q-factor of (In,Ga)N containing III-nitride microcavity grown by multiple deposition techniques. <i>Journal of Applied Physics</i> , 2013 , 114, 233102	2.5	10
226	Mode locking in monolithic two-section InGaN blue-violet semiconductor lasers. <i>Applied Physics Letters</i> , 2013 , 102, 121115	3.4	10
225	Metal-related gate sinking due to interfacial oxygen layer in Ir/InAlN high electron mobility transistors. <i>Applied Physics Letters</i> , 2010 , 96, 263515	3.4	10
224	Bias-dependent absorption coefficient of the absorber section in GaN-based multisection laser diodes. <i>Applied Physics Letters</i> , 2010 , 97, 181103	3.4	10
223	Characterization of Plasma-Induced Damage of Selectively Recessed GaN/InAlN/AlN/GaN Heterostructures Using SiCl ₄ and SF ₆ . <i>Japanese Journal of Applied Physics</i> , 2010 , 49, 116506	1.4	10
222	Emission characteristics of GaN-based blue lasers including a lattice matched Al _{0.83} In _{0.17} N optical blocking layer for improved optical beam quality. <i>Applied Physics Letters</i> , 2010 , 97, 111104	3.4	10
221	InAlN/GaN metal-oxide-semiconductor high electron mobility transistor with Al ₂ O ₃ insulating films grown by metal organic chemical vapor deposition using Ar and NH ₃ carrier gases. <i>Journal of Vacuum Science & Technology B</i> , 2009 , 27, 218		10
220	Static and dynamic properties of multi-section InGaN-based laser diodes. <i>Journal of Applied Physics</i> , 2012 , 112, 103112	2.5	10
219	High reflectivity airgap distributed Bragg reflectors realized by wet etching of AlInN sacrificial layers. <i>Applied Physics Letters</i> , 2009 , 95, 191102	3.4	10
218	Impact of quantum confinement and quantum confined Stark effect on biexciton binding energy in GaN/AlGaIn quantum wells. <i>Applied Physics Letters</i> , 2008 , 93, 152105	3.4	10
217	Nonpolar GaN-based microcavity using AlN/GaN distributed Bragg reflector. <i>Applied Physics Letters</i> , 2008 , 92, 061114	3.4	10
216	Effect of Anodic Oxidation on the Characteristics of Lattice-Matched AlInN/GaN Heterostructures. <i>Journal of Electronic Materials</i> , 2008 , 37, 616-623	1.9	10
215	Effects of Built-in Polarization Field on the Optical Properties of AlGaIn/GaN Quantum Wells. <i>Physica Status Solidi A</i> , 1999 , 176, 219-225		10
214	Luminescence and Reflectivity of GaN/sapphire grown by MOVPE, GSMBE and HVPE. <i>MRS Internet Journal of Nitride Semiconductor Research</i> , 1996 , 1, 1		10
213	ƒWƒ-Band MMIC Amplifiers Based on AlInN/GaN HEMTs Grown on Silicon. <i>IEEE Electron Device Letters</i> , 2016 , 37, 1025-1028	4.4	10
212	Thin-Wall GaN/InAlN Multiple Quantum Well Tubes. <i>Nano Letters</i> , 2017 , 17, 3347-3355	11.5	9
211	Quantification of scattering loss of III-nitride photonic crystal cavities in the blue spectral range. <i>Physical Review B</i> , 2017 , 95,	3.3	9

210	Capacitance behavior of InAlN Schottky diodes in presence of large concentrations of shallow and deep states related to oxygen. <i>Journal of Applied Physics</i> , 2015 , 117, 185701	2.5	9
209	Technology of integrated self-aligned E/D-mode n++GaN/InAlN/AlN/GaN MOS HEMTs for mixed-signal electronics. <i>Semiconductor Science and Technology</i> , 2016 , 31, 065011	1.8	9
208	Large-k exciton dynamics in GaN epilayers: Nonthermal and thermal regimes. <i>Physical Review B</i> , 2013 , 87,	3.3	9
207	Thermal annealing of molecular beam epitaxy-grown InGaN/GaN single quantum well. <i>Semiconductor Science and Technology</i> , 2012 , 27, 105023	1.8	9
206	Pressure-induced piezoelectric effects in near-lattice-matched GaN/AlInN quantum wells. <i>Journal of Applied Physics</i> , 2008 , 104, 063505	2.5	9
205	Surface morphology of AlN and size dispersion of GaN quantum dots. <i>Journal of Crystal Growth</i> , 2005 , 274, 387-393	1.6	9
204	Dual Contribution to the Stokes Shift in InGaN/GaN Quantum Wells. <i>Physica Status Solidi (B): Basic Research</i> , 2001 , 228, 111-114	1.3	9
203	Dielectric Microcavity in GaN/Si. <i>Physica Status Solidi A</i> , 2001 , 183, 35-39		9
202	Improved Radiative Efficiency using Self-Formed GaInN/GaN Quantum Dots Grown by Molecular Beam Epitaxy. <i>Physica Status Solidi A</i> , 2000 , 180, 363-368		9
201	Photoreflectance spectroscopy as a powerful tool for the investigation of GaN/AlGaIn quantum well structures. <i>Solid State Communications</i> , 1999 , 109, 567-571	1.6	9
200	Real-time control of the molecular beam epitaxy of nitrides. <i>Journal of Crystal Growth</i> , 1999 , 201-202, 382-387	1.6	9
199	Effect of the nucleation layer deposition temperature on the nature of defects in GSMBE GaN films. <i>Journal of Crystal Growth</i> , 1999 , 201-202, 423-428	1.6	9
198	How to induce the epitaxial growth of gallium nitride on Si(001). <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 1995 , 29, 74-77	3.1	9
197	Measurement of polarization-induced electric fields in GaN/AlInN quantum wells. <i>Applied Physics Letters</i> , 2012 , 101, 251902	3.4	8
196	Defect states characterization of non-annealed and annealed ZrO ₂ /InAlN/GaN structures by capacitance measurements. <i>Applied Physics Letters</i> , 2013 , 102, 063502	3.4	8
195	Temperature-Dependence of Exciton Radiative Recombination in (Al,Ga)N/GaN Quantum Wells Grown on a-Plane GaN Substrates. <i>Japanese Journal of Applied Physics</i> , 2013 , 52, 08JC01	1.4	8
194	TEM and XANES study of MOVPE grown InAlN layers with different indium content. <i>Journal of Physics: Conference Series</i> , 2011 , 326, 012013	0.3	8
193	Optical bistability in InGaN-based multisection laser diodes. <i>Applied Physics Letters</i> , 2011 , 98, 191115	3.4	8

192	Self-Pulsation at Zero Absorber Bias in GaN-Based Multisection Laser Diodes. <i>Applied Physics Express</i> , 2011 , 4, 062702	2.4	8
191	Optically pumped long external cavity InGaN/GaN surface-emitting laser with injection seeding from a planar microcavity. <i>Applied Physics Letters</i> , 2012 , 101, 141120	3.4	8
190	Optoelectronic characterization of blue InGaN/GaN LEDs grown by MBE. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2001 , 82, 256-258	3.1	8
189	MBE grown InGaN quantum dots and quantum wells: effects of in-plane localization. <i>Thin Solid Films</i> , 2000 , 380, 195-197	2.2	8
188	Temperature Dependence of Photoluminescence Intensities of Undoped and Doped GaN. <i>Physica Status Solidi (B): Basic Research</i> , 1999 , 216, 605-608	1.3	8
187	Critical Thickness for Islanded Growth of Highly Strained $\text{In}_x\text{Ga}_{1-x}\text{As}$ on GaAs(001). <i>Japanese Journal of Applied Physics</i> , 1994 , 33, L1427	1.4	8
186	Vacancy-type defects in Mg-doped GaN grown by ammonia-based molecular beam epitaxy probed using a monoenergetic positron beam. <i>Journal of Applied Physics</i> , 2016 , 119, 245702	2.5	8
185	Low p-type contact resistance by field-emission tunneling in highly Mg-doped GaN. <i>Applied Physics Letters</i> , 2016 , 109, 252101	3.4	8
184	High-speed and low-noise AlInN/GaN HEMTs on SiC. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2011 , 208, 429-433	1.6	7
183	Tailoring the strong coupling regime in III-nitride based microcavities for room temperature polariton laser applications. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2009 , 6, 2820-2827		7
182	Influence of GaN capping on performance of InAlN/AlN/GaN MOS-HEMT with Al ₂ O ₃ gate insulation grown by CVD. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2008 , 5, 1956-1958		7
181	Growth mode induced carrier localization in InGaN/GaN quantum wells. <i>Philosophical Magazine</i> , 2007 , 87, 2067-2075	1.6	7
180	Two-dimensional pseudo-donor-acceptor-pairs model of recombination dynamics in InGaN/GaN quantum wells. <i>Physica E: Low-Dimensional Systems and Nanostructures</i> , 2003 , 17, 64-67	3	7
179	Localization in highly strained In _{0.35} Ga _{0.65} As/GaAs ultrathin quantum wells. <i>Superlattices and Microstructures</i> , 1993 , 14, 39	2.8	7
178	Selective heteroepitaxy on deeply grooved substrate: A route to low cost semipolar GaN platforms of bulk quality. <i>Applied Physics Letters</i> , 2016 , 109, 082101	3.4	7
177	Low-temperature growth of n ⁺⁺ -GaN by metalorganic chemical vapor deposition to achieve low-resistivity tunnel junctions on blue light emitting diodes. <i>Semiconductor Science and Technology</i> , 2019 , 34, 015002	1.8	7
176	GaN buffer growth temperature and efficiency of InGaN/GaN quantum wells: The critical role of nitrogen vacancies at the GaN surface. <i>Applied Physics Letters</i> , 2021 , 118, 111102	3.4	7
175	Impact of defects on Auger recombination in c-plane InGaN/GaN single quantum well in the efficiency droop regime. <i>Applied Physics Letters</i> , 2020 , 116, 222106	3.4	6

174	GaN-based superluminescent diodes with long lifetime 2016 ,		6
173	. <i>IEEE Photonics Technology Letters</i> , 2013 , 25, 1514-1516	2.2	6
172	Determining the nature of excitonic dephasing in high-quality GaN/AlGa _N quantum wells through time-resolved and spectrally resolved four-wave mixing spectroscopy. <i>Physical Review B</i> , 2017 , 96,	3.3	6
171	InGa _N laser diodes emitting at 500 nm with p-layers grown by molecular beam epitaxy. <i>Applied Physics Express</i> , 2015 , 8, 022105	2.4	6
170	Investigation of InGa _N /Ga _N quantum wells for polariton laser diodes. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2012 , 9, 1325-1329		6
169	Quantum confinement dependence of the energy splitting and recombination dynamics of A and B excitons in a GaN/AlGa _N quantum well. <i>Physical Review B</i> , 2009 , 79,	3.3	6
168	Implementation of Spatio-Time-Resolved Cathodoluminescence Spectroscopy for Studying Local Carrier Dynamics in a Low Dislocation Density $m\text{-Plane In}_{0.05}\text{Ga}_{0.95}\text{N}$ Epilayer Grown on a Freestanding GaN Substrate. <i>Japanese Journal of Applied Physics</i> , 2011 , 50, 111002	1.4	6
167	Optimization of the ohmic contact processing in InAlN//GaN high electron mobility transistors for lower temperature of annealing. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2010 , 7, 108-111		6
166	Comparative optical characterization of GaN grown by metal-organic vapor phase epitaxy, gas source molecular beam epitaxy and halide vapor phase epitaxy. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 1997 , 43, 237-241	3.1	6
165	Barrier layer downscaling of InAlN/GaN HEMTs. <i>Device Research Conference, IEEE Annual</i> , 2007 ,		6
164	Strong electric field and nonuniformity effects in GaN/AlN quantum dots revealed by high pressure studies. <i>Applied Physics Letters</i> , 2006 , 89, 051902	3.4	6
163	Solar blind AlGa _N photodetectors with a very high spectral selectivity. <i>EPJ Applied Physics</i> , 2006 , 33, 5-7	1.1	6
162	High-temperature annealing of AlGa _N : Stress, structural, and compositional changes. <i>Journal of Applied Physics</i> , 2003 , 94, 6366-6371	2.5	6
161	Cw and time-resolved spectroscopy in homoepitaxial Ga _N films and Ga _N /AlGa _N quantum wells grown by molecular beam epitaxy. <i>Solid State Communications</i> , 2001 , 117, 445-448	1.6	6
160	Phonon Replica Dynamics in High Quality Ga _N Epilayers and AlGa _N /Ga _N Quantum Wells. <i>Physica Status Solidi A</i> , 2001 , 183, 129-134		6
159	Recombination Dynamics in Ga _N /AlGa _N Quantum Wells: The Role of Built-in Fields. <i>Physica Status Solidi A</i> , 2001 , 188, 851-855		6
158	Resonant Raman scattering in (Al,Ga) _N /Ga _N quantum well structures. <i>Thin Solid Films</i> , 2000 , 364, 156-160.	2	6
157	Multi Phonon Resonant Raman Scattering in Ga _N /Al _x Ga _{1-x} N Quantum Wells. <i>Physica Status Solidi (B): Basic Research</i> , 1999 , 216, 799-802	1.3	6

156	Monolayer thickness control of In _x Ga _{1-x} As/GaAs quantum wells grown by metalorganic molecular beam epitaxy. <i>Applied Physics Letters</i> , 1994 , 64, 1523-1525	3.4	6
155	Defect incorporation in In-containing layers and quantum wells: experimental analysis via deep level profiling and optical spectroscopy. <i>Journal Physics D: Applied Physics</i> , 2021 , 54, 025108	3	6
154	Impact of Mode-Hopping Noise on InGaN Edge Emitting Laser Relative Intensity Noise Properties. <i>IEEE Journal of Quantum Electronics</i> , 2018 , 54, 1-7	2	5
153	Impact of surface morphology on the properties of light emission in InGaN epilayers. <i>Applied Physics Express</i> , 2018 , 11, 051004	2.4	5
152	Short cavity InGaN-based laser diodes with cavity length below 300 nm. <i>Semiconductor Science and Technology</i> , 2019 , 34, 085005	1.8	5
151	GaN on sapphire mesa technology. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2012 , 9, 945-948		5
150	ZrO ₂ /InAlN/GaN MetalOxideSemiconductor Heterostructure Field-Effect Transistors with InAlN Barrier of Different Compositions. <i>Japanese Journal of Applied Physics</i> , 2013 , 52, 08JN07	1.4	5
149	AlN-Capped AlInN/GaN High Electron Mobility Transistors with 4.5 W/mm Output Power at 40 GHz. <i>Japanese Journal of Applied Physics</i> , 2013 , 52, 08JN16	1.4	5
148	Time-resolved cathodoluminescence on polychromatic light emitting (In,Ga)N quantum wells grown on (11-22) GaN facets. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2011 , 8, 1394-1397		5
147	Probing exciton density of states through phonon-assisted emission in GaN epilayers: A and B exciton contributions. <i>Physical Review B</i> , 2010 , 82,	3.3	5
146	Spin relaxation of free excitons in narrow GaN/Al _x Ga _{1-x} N quantum wells. <i>Physical Review B</i> , 2010 , 82,	3.3	5
145	Defects in a-GaN grown on r-sapphire by hydride vapor phase epitaxy. <i>Journal of Crystal Growth</i> , 2011 , 327, 6-12	1.6	5
144	Nonlinear emission properties of an optically anisotropic GaN-based microcavity. <i>Physical Review B</i> , 2012 , 86,	3.3	5
143	Effects of Polarization in Optoelectronic Quantum Structures 2008 , 467-511		5
142	Temperature mapping of Al _{0.85} In _{0.15} N/AlN/GaN high electron mobility transistors through micro-photoluminescence studies. <i>EPJ Applied Physics</i> , 2009 , 47, 30301	1.1	5
141	Strain relaxation of AlN epilayers for Stranski-Krastanov GaN/AlN quantum dots grown by metal organic vapor phase epitaxy. <i>Journal of Crystal Growth</i> , 2007 , 299, 254-258	1.6	5
140	AlInN/GaN a suitable HEMT device for extremely high power high frequency applications 2007 ,		5
139	Observation of localization effects in InGaN/GaN quantum structures by means of the application of hydrostatic pressure. <i>Physica Status Solidi (B): Basic Research</i> , 2004 , 241, 3285-3292	1.3	5

138	Steady-State and Time-Resolved Near-Field Optical Spectroscopy of GaN/AlN Quantum Dots and InGaN/GaN Quantum Wells. <i>Physica Status Solidi A</i> , 2002 , 190, 155-160		5
137	Resonant and Non-Resonant Dynamics of Excitons and Free Carriers in GaN/AlGaIn Quantum Wells. <i>Physica Status Solidi A</i> , 2002 , 190, 87-92		5
136	Intraband spectroscopy of self-organized GaN/AlN quantum dots. <i>Physica E: Low-Dimensional Systems and Nanostructures</i> , 2003 , 17, 60-63	3	5
135	Optical properties of self-assembled InGaIn/GaN quantum dots. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2001 , 82, 151-155	3.1	5
134	Photoluminescence Excitation Spectroscopy of MBE Grown InGaIn Quantum Wells and Quantum Boxes. <i>Physica Status Solidi (B): Basic Research</i> , 2001 , 228, 129-132	1.3	5
133	Impact ionization of excitons in an electric field in GaN. <i>Journal of Physics Condensed Matter</i> , 2001 , 13, 7043-7052	1.8	5
132	Observation of magnetophotoluminescence from a GaN/AlxGa1-xN heterojunction. <i>Physical Review B</i> , 2002 , 65,	3.3	5
131	Temperature Dependence of Hexagonal-GaN Optical Properties below the Bandgap. <i>Physica Status Solidi (B): Basic Research</i> , 1999 , 216, 73-77	1.3	5
130	Terrace length commensurability and surface reconstruction in highly strained InGaAs/GaAs quantum wells grown on vicinal substrates. <i>Superlattices and Microstructures</i> , 1994 , 15, 155	2.8	5
129	Indium segregation and misorientation effects on the optical properties of MBE grown In0.35Ga0.65As/GaAs quantum wells. <i>European Physical Journal Special Topics</i> , 1993 , 03, C5-295-C5-298		5
128	Broadened Bandwidth Amplified Spontaneous Emission from Blue GaN-Based Short-Cavity Superluminescent Light-Emitting Diodes. <i>ECS Journal of Solid State Science and Technology</i> , 2020 , 9, 0150219		5
127	Imaging Nonradiative Point Defects Buried in Quantum Wells Using Cathodoluminescence. <i>Nano Letters</i> , 2021 , 21, 5217-5224	11.5	5
126	Fermi-level pinning and intrinsic surface states of Al1-xInxN(1010) surfaces. <i>Applied Physics Letters</i> , 2017 , 110, 022104	3.4	4
125	Vectorial near-field imaging of a GaN based photonic crystal cavity. <i>Applied Physics Letters</i> , 2015 , 107, 101110	3.4	4
124	Si-interdiffusion in heavily doped AlN-GaN-based quantum well intersubband photodetectors. <i>Applied Physics Letters</i> , 2011 , 98, 241101	3.4	4
123	ABOVE 2 A/mm DRAIN CURRENT DENSITY OF GaN HEMTS GROWN ON SAPPHIRE. <i>International Journal of High Speed Electronics and Systems</i> , 2007 , 17, 91-95	0.5	4
122	Photoluminescence properties of multiple stacked planes of GaN/AlN quantum dots studied by near-field optical microscopy. <i>Journal of Microscopy</i> , 2001 , 202, 212-7	1.9	4
121	Time-resolved spectroscopy of MBE-grown GaN/AlGaIn hetero- and homo-epitaxial quantum wells. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2001 , 82, 140-142	3.1	4

120	Photoconductance measurements and Stokes shift in InGaN alloys. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2001 , 82, 197-199	3.1	4
119	Near-Field Optical Spectroscopy of Multiple Stacked Planes of GaN/AlN Quantum Dots. <i>Physica Status Solidi (B): Basic Research</i> , 2001 , 224, 53-56	1.3	4
118	Absorption and Emission of (In,Ga)N/GaN Quantum Wells Grown by Molecular Beam Epitaxy. <i>Physica Status Solidi A</i> , 2001 , 183, 139-143		4
117	Large Built-in Electric Field and Its Influence on the Pressure Behavior of the Light Emission from GaN/AlGaIn Strained Quantum Wells. <i>Physica Status Solidi A</i> , 2001 , 188, 839-843		4
116	Magneto-photoluminescence of AlGaIn/GaN quantum wells. <i>Journal of Crystal Growth</i> , 2001 , 230, 487-491	16	4
115	Field distribution and collection efficiency in an AlGaIn metal-semiconductor-metal detector. <i>Journal of Applied Physics</i> , 2002 , 91, 6095-6098	2.5	4
114	Spin orientation by optical pumping of strained In _{0.35} Ga _{0.65} As/GaAs quantum wells grown on vicinal substrates. <i>Superlattices and Microstructures</i> , 1993 , 14, 117	2.8	4
113	Properties of InAlN layers nearly lattice-matched to GaN and their use for photonics and electronics 2013 , 177-226		4
112	Far-field coupling in nanobeam photonic crystal cavities. <i>Applied Physics Letters</i> , 2016 , 108, 201104	3.4	4
111	Photocapacitance spectroscopy of InAlN nearly lattice-matched to GaN. <i>Applied Physics Letters</i> , 2016 , 109, 152102	3.4	4
110	Strain and compositional fluctuations in Al _{0.81} In _{0.19} N/GaN heterostructures. <i>Applied Physics Letters</i> , 2016 , 109, 132102	3.4	4
109	Single photon emission and recombination dynamics in self-assembled GaN/AlN quantum dots.. <i>Light: Science and Applications</i> , 2022 , 11, 114	16.7	4
108	Multilayer porous structures on GaN for the fabrication of Bragg reflectors 2017 ,		3
107	Excited states of neutral donor bound excitons in GaN. <i>Journal of Applied Physics</i> , 2018 , 123, 215702	2.5	3
106	Light-emitting diode technology and applications: introduction. <i>Photonics Research</i> , 2017 , 5, LED1	6	3
105	Solitary pulse-on-demand production by optical injection locking of passively Q-switched InGaIn diode laser near lasing threshold. <i>Applied Physics Letters</i> , 2015 , 106, 071101	3.4	3
104	Peculiarities in the pressure dependence of photoluminescence in InAlN. <i>Physica Status Solidi (B): Basic Research</i> , 2013 , 250, 677-682	1.3	3
103	Optical and structural properties of an Eu implanted gallium nitride quantum dots/aluminium nitride superlattice. <i>Journal of Nanoscience and Nanotechnology</i> , 2010 , 10, 2473-8	1.3	3

102	Au Free Ohmic Contacts for High Temperature InAlN/GaN HEMT's. <i>ECS Transactions</i> , 2009 , 25, 33-36	1	3
101	Growth of intersubband GaN/AlGaN heterostructures 2010 ,		3
100	Suppression of leakage currents in GaN-based LEDs induced by reactive-ion etching damages. <i>EPJ Applied Physics</i> , 2008 , 43, 51-53	1.1	3
99	Nitride-based heterostructures grown by MOCVD for near- and mid-infrared intersubband transitions. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2007 , 204, 1100-1104	1.6	3
98	Spectroscopy of the electron states in self-organized GaN/AlN quantum dots. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2004 , 1, 1456-1460		3
97	In K-edge extended X-ray absorption fine structure of InGaN epilayers and quantum boxes. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2002 , 93, 150-153	3.1	3
96	RBS studies of AlGaIn/AlN Bragg reflectors. <i>Physica Status Solidi A</i> , 2003 , 195, 502-507		3
95	Time-Resolved Spectroscopy of MBE-Grown Nitride Based Heterostructures. <i>Physica Status Solidi A</i> , 2000 , 178, 101-105		3
94	Quantum-Confined Stark Effect and Recombination Dynamics of Spatially Indirect Excitons in MBE-Grown GaN-AlGaIn Quantum Wells. <i>MRS Internet Journal of Nitride Semiconductor Research</i> , 1999 , 4, 375-380		3
93	Growth Kinetics of GaN in Ammonia Atmosphere. <i>Physica Status Solidi A</i> , 1999 , 176, 333-336		3
92	Effect of the Nitridation of the Sapphire (0001) Substrate on the GaN Growth. <i>Materials Research Society Symposia Proceedings</i> , 1996 , 449, 67		3
91	Effects of 5 MeV electron irradiation on deep traps and electroluminescence from near-UV InGaIn/GaN single quantum well light-emitting diodes with and without InAlN superlattice underlayer. <i>Journal Physics D: Applied Physics</i> , 2020 , 53, 445111	3	3
90	High conductivity InAlN/GaN multi-channel two-dimensional electron gases. <i>Semiconductor Science and Technology</i> , 2021 , 36, 055020	1.8	3
89	Ultrafast-nonlinear ultraviolet pulse modulation in an AlInGaIn polariton waveguide operating up to room temperature. <i>Nature Communications</i> , 2021 , 12, 3504	17.4	3
88	Quantification of roughness and spatial distribution of dislocations in MBE and MOVPE grown LED heterostructures. <i>Materials Science in Semiconductor Processing</i> , 2016 , 55, 12-18	4.3	3
87	Dark-level trapping, lateral confinement, and built-in electric field contributions to the carrier dynamics in c-plane GaN/AlN quantum dots emitting in the UV range. <i>Journal of Applied Physics</i> , 2021 , 129, 054301	2.5	3
86	Smooth GaN membranes by polarization-assisted electrochemical etching. <i>Applied Physics Letters</i> , 2021 , 118, 062107	3.4	3
85	Molecular Beam Epitaxy of Group-III Nitrides on Silicon Substrates: Growth, Properties and Device Applications 2001 , 188, 501		3

84	Deep traps in InGaN/GaN single quantum well structures grown with and without InGaN underlayers. <i>Journal of Alloys and Compounds</i> , 2020 , 845, 156269	5.7	2
83	Low loss EEL spectroscopy performed on In _x Al _{1-x} N layers grown by MOVPE: comparison between experiment and ab-initio calculations. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2012 , 9, 989-992		2
82	In-depth analysis of injection-seeded long external cavity InGaN/GaN surface-emitting laser. <i>Journal of Applied Physics</i> , 2013 , 113, 043108	2.5	2
81	Measurement of the tuneable absorption in GaN-based multi-section laser diodes. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2011 , 8, 2345-2347		2
80	Buffer-Related Degradation Aspects of Single and Double-Heterostructure Quantum Well InAlN/GaN High-Electron-Mobility Transistors. <i>Japanese Journal of Applied Physics</i> , 2012 , 51, 054102	1.4	2
79	Thermal stability of 5 nm barrier InAlN/GaN HEMTs 2007 ,		2
78	Microcavity Light Emitting Diodes Based on GaN membranes Grown by Molecular Beam Epitaxy on Silicon. <i>Japanese Journal of Applied Physics</i> , 2003 , 42, 118-121	1.4	2
77	UV Metal Semiconductor Metal Detectors 2004 , 77-92		2
76	Contribution to quantitative measurement of the In composition in GaN/InGaN multilayers. <i>Materials Chemistry and Physics</i> , 2003 , 81, 273-276	4.4	2
75	InGaN/GaN quantum wells grown by molecular beam epitaxy emitting at 300 K in the whole visible spectrum. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2001 , 82, 224-226	3.1	2
74	Confined exciton-polariton modes in a thin, homo-epitaxial, GaN film grown by molecular beam epitaxy. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2001 , 82, 173-177	3.1	2
73	Electric-field-induced impact ionization of excitons in GaN and GaN/AlGaIn quantum wells. <i>Physics of the Solid State</i> , 2001 , 43, 2321-2327	0.8	2
72	High Magnetic Field Studies of AlGaIn/GaN Heterostructures Grown on Bulk GaN, SiC, and Sapphire Substrates. <i>Materials Research Society Symposia Proceedings</i> , 2000 , 639, 731		2
71	Violet InGaIn/GaN Light Emitting Diodes Grown by Molecular Beam Epitaxy Using NH ₃ . <i>Japanese Journal of Applied Physics</i> , 1998 , 37, L907-L909	1.4	2
70	Photoreflectance Spectroscopy Investigation of GaN/AlGaIn Quantum Well Structures. <i>Physica Status Solidi (B): Basic Research</i> , 1999 , 216, 221-225	1.3	2
69	Lateral localization effects in strained InGaAs/GaAs semiconductor quantum wells grown on vicinal surfaces 1994 , 2139, 222		2
68	Modeling the electrical characteristics of InGaIn/GaN LED structures based on experimentally-measured defect characteristics. <i>Journal Physics D: Applied Physics</i> , 2021 , 54, 425105	3	2
67	Near-UV narrow bandwidth optical gain in lattice-matched IIIbNitride waveguides. <i>Japanese Journal of Applied Physics</i> , 2018 , 57, 090305	1.4	1

66	GaN L3 Photonic Crystal Cavities With an Average Quality Factor in Excess of 16000 in the Near Infrared 2015 ,		1
65	Interaction between meta-materials and shallow donors in bulk GaN at THz frequency. <i>Optics Express</i> , 2014 , 22, 3199-207	3.3	1
64	Triggering of guiding and antiguiding effects in GaN-based VCSELs 2014 ,		1
63	Early stage degradation of InAlN/GaN HEMTs during electrical stress 2012 ,		1
62	InAlN/GaN heterostructures for microwave power and beyond 2009 ,		1
61	Si and Mg Doped GaN Layers Grown by Gas Source Molecular Beam Epitaxy Using Ammonia. <i>Materials Research Society Symposia Proceedings</i> , 1997 , 482, 295		1
60	Radiative lifetime in wurtzite GaN/AlN quantum dots. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2007 , 4, 183-186		1
59	Strain and compositional analyses of Al-rich Al _{1-x} In _x N films grown by MOVPE: impact on the applicability of Vegard's rule. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2008 , 5, 1859-1862		1
58	High Performance Solar Blind Detectors based on AlGaIn grown by MBE and MOCVD. <i>Materials Research Society Symposia Proceedings</i> , 2003 , 798, 307		1
57	Nontrivial carrier recombination dynamics and optical properties of over-excited GaN/AlN quantum dots. <i>Physica Status Solidi (B): Basic Research</i> , 2004 , 241, 2779-2782	1.3	1
56	Micro-photoluminescence of GaN quantum dots embedded in 100 nm wide cylindrical AlN pillars. <i>Superlattices and Microstructures</i> , 2004 , 36, 783-790	2.8	1
55	Cathodoluminescence study of the excitons localization in AlGaIn/GaN and InGaIn/GaN quantum wells grown on sapphire. <i>Journal of Crystal Growth</i> , 2003 , 247, 284-290	1.6	1
54	Optical properties of GaN/AlN quantum boxes under high photo-excitation. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2003 , 2666-2669		1
53	AlGaIn/GaN HEMTs on Resistive Si(111) Substrate: From Material Assessment to RF Power Performances. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2003 , 61-64		1
52	Modelling of absorption and emission spectra of In _x Ga _{1-x} N layers grown by MBE. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2001 , 82, 71-73	3.1	1
51	Potentialities of GaN-Based Microcavities Grown on Silicon Substrates. <i>Physica Status Solidi A</i> , 2001 , 188, 519-522		1
50	Microscopic Description of Radiative Recombinations in InGaIn/GaN Quantum Systems. <i>Materials Research Society Symposia Proceedings</i> , 2002 , 743, L5.5.1		1
49	Recombination Dynamics in Nitride Quantum Boxes and Quantum Wells for Colors Ranging from the UV to the Red. <i>Materials Research Society Symposia Proceedings</i> , 2000 , 639, 1011		1

48	Group-III Nitride Quantum Heterostructures Emitting in the whole Visible Range. <i>Materials Research Society Symposia Proceedings</i> , 2000 , 639, 1211		1
47	Universal behavior of the pressure coefficient of the light absorption and emission in InGaN structures. <i>Materials Research Society Symposia Proceedings</i> , 2000 , 639, 981		1
46	Optical and Structural Properties of AlGaIn/GaN Quantum Wells Grown by Molecular Beam Epitaxy. <i>Materials Research Society Symposia Proceedings</i> , 1998 , 537, 1		1
45	Quantum-Confined Stark Effect and Recombination Dynamics of Spatially Indirect Excitons in MBE-Grown GaN-AlGaIn Quantum Wells. <i>Materials Research Society Symposia Proceedings</i> , 1998 , 537, 1		1
44	GaN/GaInN-based light emitting diodes grown by molecular beam epitaxy using NH ₃ . <i>Journal of Crystal Growth</i> , 1999 , 201-202, 323-326	1.6	1
43	Thermal Stability of GaN Investigated by Raman Scattering. <i>MRS Internet Journal of Nitride Semiconductor Research</i> , 1999 , 4, 653-658		1
42	The Role of Internal Electric Fields in III-N Quantum Structure. <i>Acta Physica Polonica A</i> , 2001 , 100, 261-270.6		1
41	Solar Blind (Al,Ga)N Metal-Semiconductor-Metal Devices for High Performance Flame Detection. <i>Materials Research Society Symposia Proceedings</i> , 2003 , 764, 1		1
40	Localization Effects in GaN/AlGaIn Quantum Well - Photoluminescence Studies. <i>Acta Physica Polonica A</i> , 2003 , 103, 573-578	0.6	1
39	GaN superluminescent diodes and their applications 2016 ,		1
38	High p-type GaN for advanced optoelectronic devices 2016 ,		1
37	Assessing the Composition of Wide Bandgap Compound Semiconductors by Atom Probe Tomography: A Metrological Problem. <i>Microscopy and Microanalysis</i> , 2016 , 22, 650-651	0.5	1
36	Optical properties of nearly lattice-matched GaN/(Al,In)N quantum wells. <i>Journal of Applied Physics</i> , 2016 , 119, 205708	2.5	1
35	Scale Effects on Exciton Localization and Nonradiative Processes in GaN/AlGaIn Quantum Wells 2000 , 180, 127		1
34	Reduction of Carrier In-Plane Mobility in Group-III Nitride Based Quantum Wells: The Role of Internal Electric Fields 2001 , 183, 61		1
33	Molecular Beam Epitaxy of Group-III Nitrides on Silicon Substrates: Growth, Properties and Device Applications 2001 , 188, 501		1
32	The Effects of Localization and of Electric Fields on LO-Phonon Exciton Coupling in InGaIn/GaN Quantum Wells and Quantum Boxes 2002 , 190, 149		1
31	Near ultraviolet photonic integrated lasers based on silicon nitride. <i>APL Photonics</i> , 2022 , 7, 046108	5.2	1

- 30 Effects of quantum-well indium content on deep defects and reliability of InGaN/GaN light-emitting diodes with under layer. *Journal Physics D: Applied Physics*, **2021**, 54, 505108 3 0
- 29 Phase and Spin Relaxation Dynamics in High-Quality Single GaN/AlGaN Quantum Well. *Springer Proceedings in Physics*, **2015**, 14-15 0.2
- 28 Effects of the annealing temperature on the structural and electronic properties of MBE grown InGaN/GaN quantum wells. *Journal of Physics: Conference Series*, **2011**, 326, 012012 0.3
- 27 Mapping Polarization Fields in Al_{0.85}In_{0.15}N/AlN/GaN Heterostructures. *Microscopy and Microanalysis*, **2009**, 15, 1048-1049 0.5
- 26 Stress Modulated Composition Fluctuation and Diffusion in near lattice match AlInN/GaN. *Microscopy and Microanalysis*, **2009**, 15, 1020-1021 0.5
- 25 Effects of segregation on the optical properties of (In,Ga)As/GaAs quantum wells grown by MBE under various conditions. *Materials Science and Engineering B: Solid-State Materials for Advanced Technology*, **1997**, 44, 151-154 3.1
- 24 III-Nitride High-Brightness Light-Emitting Diodes 75-98
- 23 Biexciton recombination in high quality GaN/AlGaN quantum wells. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2008**, 5, 2254-2256
- 22 Progresses in III-Nitride Distributed Bragg Reflectors and Microcavities Using AlInN/GaN Materials 261-286
- 21 Optical detection of 2DEG in GaN/AlGaN structures [High magnetic field studies. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2004**, 1, 193-197
- 20 Exciton Oscillator Strength in GaN/AlGaN Quantum Wells. *Physica Status Solidi A*, **2002**, 190, 129-133
- 19 Residual donors in wurtzite GaN homoepitaxial layers and heterostructures. *Physica Status Solidi (B): Basic Research*, **2003**, 235, 20-25 1.3
- 18 Spectroscopy of Intraband Electron Confinement in Self-Assembled GaN/AlN Quantum Dots. *Materials Research Society Symposia Proceedings*, **2003**, 798, 575
- 17 Occurrence of Accidental In_n Quantum Dots in Indium Gallium Nitride/Gallium Nitride Heterostructures. *Materials Research Society Symposia Proceedings*, **2002**, 737, 195
- 16 Indium distribution inside quantum wells: The effect of growth interruption in MBE. *Materials Research Society Symposia Proceedings*, **2002**, 743, L6.6.1
- 15 Piezoelectric Field and its Influence on the Pressure Behavior of the Light Emission from InGaN/GaN and GaN/AlGaN Quantum Wells. *Materials Research Society Symposia Proceedings*, **2001**, 693, 728
- 14 Phonons and Holes in Magnesium Doped GaN. *Materials Research Society Symposia Proceedings*, **1998**, 512, 333
- 13 Effect of V/III Ratio on the Properties of GaN Layers Grown by Molecular Beam Epitaxy Using NH₃. *Materials Research Society Symposia Proceedings*, **1998**, 512, 69

- 12 Molecular Beam Epitaxy of High Quality InGaN Alloys Using Ammonia: Optical and Structural Properties. *Materials Research Society Symposia Proceedings*, **1998**, 537, 1
- 11 Thermal Stability of GaN Investigated by Raman Scattering. *Materials Research Society Symposia Proceedings*, **1998**, 537, 1
- 10 Optical and Structural Properties of AlGaIn/GaN Quantum Wells Grown by Molecular Beam Epitaxy. *MRS Internet Journal of Nitride Semiconductor Research*, **1999**, 4, 962-967
- 9 Molecular Beam Epitaxy of High Quality InGaN Alloys Using Ammonia: Optical and Structural Properties. *MRS Internet Journal of Nitride Semiconductor Research*, **1999**, 4, 333-338
- 8 Impact Ionization of Excitons in an Electric Field in GaN. *Physica Status Solidi (B): Basic Research*, **1999**, 216, 63-67 1.3
- 7 Rutherford backscattering spectrometry, particle induced X-ray emission and atomic force microscopy of InAs thin films grown on GaAs: a complementary study. *Thin Solid Films*, **1996**, 278, 155-165^{2,2}
- 6 Growth of ultra-thin AlAs layers on GaAs (001) vicinal surfaces: a search for lateral confinement. *Journal of Crystal Growth*, **1993**, 127, 831-835 1.6
- 5 In distribution in InGaIn quantum wells: influence of phase separation, In segregation and In desorption **2018**, 285-288
- 4 Implementation of Spatio-Time-Resolved Cathodoluminescence Spectroscopy for Studying Local Carrier Dynamics in a Low Dislocation Density-m-Plane In_{0.05}Ga_{0.95}N Epilayer Grown on a Freestanding GaN Substrate. *Japanese Journal of Applied Physics*, **2011**, 50, 111002 1.4
- 3 Toward Quantum Fluids at Room Temperature: Polariton Condensation in III-Nitride Based Microcavities. *Springer Series in Solid-state Sciences*, **2013**, 201-230 0.4
- 2 Interplay of intrinsic and extrinsic states in pinning and passivation of m-plane facets of GaN n-p-n junctions. *Journal of Applied Physics*, **2020**, 128, 185701 2.5
- 1 TEM study of defect reduction in the growth of semipolar GaN grown on patterned substrates **2016**, 590-591