

Gilles Patriarche

List of Publications by Year in Descending Order

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Version: 2024-04-10

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

593 papers	12,685 citations	55 h-index	87 g-index
657 ext. papers	14,136 ext. citations	4.1 avg, IF	6.31 L-index

#	Paper	IF	Citations
593	Up to 300 K lasing with GeSn-On-Insulator microdisk resonators.. <i>Optics Express</i> , 2022 , 30, 3954-3961	3.3	2
592	Influence of Sapphire Substrate Orientation on the van der Waals Epitaxy of III-Nitrides on 2D Hexagonal Boron Nitride: Implication for Optoelectronic Devices. <i>ACS Applied Nano Materials</i> , 2022 , 5, 791-800	5.6	0
591	Nanoindentation investigation of solid-solution strengthening in III-V semiconductor alloys. <i>International Journal of Materials Research</i> , 2022 , 96, 1237-1241	0.5	1
590	Electroluminescence from nanocrystals above 2 μ m. <i>Nature Photonics</i> , 2022 , 16, 38-44	33.9	6
589	Photo-Activated Phosphorescence of Ultrafine ZnS:Mn Quantum Dots: On the Lattice Strain Contribution. <i>Journal of Physical Chemistry C</i> , 2022 , 126, 1531-1541	3.8	
588	Indentation behaviour of (011) thin films of III-V semiconductors: polarity effect differences between GaAs and InP. <i>International Journal of Materials Research</i> , 2022 , 97, 1230-1234	0.5	
587	In-Situ Transmission Electron Microscopy Observation of Germanium Growth on Freestanding Graphene: Unfolding Mechanism of 3D Crystal Growth During Van der Waals Epitaxy. <i>Small</i> , 2021 , e2101890	11.9	11
586	GeSnOI mid-infrared laser technology. <i>Light: Science and Applications</i> , 2021 , 10, 232	16.7	5
585	Porous nanoparticles with engineered shells release their drug cargo in cancer cells. <i>International Journal of Pharmaceutics</i> , 2021 , 610, 121230	6.5	2
584	Development of Micron Sized Photonic Devices Based on Deep GaN Etching. <i>Photonics</i> , 2021 , 8, 68	2.2	1
583	Temperature dependence of optical properties of InAs/InP quantum rod-nanowires grown on Si substrate. <i>Journal of Luminescence</i> , 2021 , 231, 117814	3.8	0
582	Degradation Mechanism of Porous Metal-Organic Frameworks by In Situ Atomic Force Microscopy. <i>Nanomaterials</i> , 2021 , 11,	5.4	9
581	Band-Gap Landscape Engineering in Large-Scale 2D Semiconductor van der Waals Heterostructures. <i>ACS Nano</i> , 2021 , 15, 7279-7289	16.7	8
580	Fabrication and characterization of ZnO:Sb/n-ZnO homojunctions. <i>Applied Physics A: Materials Science and Processing</i> , 2021 , 127, 1	2.6	
579	Correlating Structure and Detection Properties in HgTe Nanocrystal Films. <i>Nano Letters</i> , 2021 , 21, 4145-4151	11.5	12
578	Monolithic Free-Standing Large-Area Vertical III-N Light-Emitting Diode Arrays by One-Step h-BN-Based Thermomechanical Self-Lift-Off and Transfer. <i>ACS Applied Electronic Materials</i> , 2021 , 3, 2614-2621	4.3	3
577	MOVPE of GaN-based mixed dimensional heterostructures on wafer-scale layered 2D hexagonal boron nitride: A key enabler of III-nitride flexible optoelectronics. <i>APL Materials</i> , 2021 , 9, 061101	5.7	2

576	Spray-Drying Polymer Encapsulation of CsPbBr ₃ Perovskite Nanocrystals with Enhanced Photostability for LED Downconverters. <i>ACS Applied Nano Materials</i> , 2021 , 4, 7502-7512	5.6	1
575	Experimental quantification of atomically-resolved HAADF-STEM images using EDX. <i>Ultramicroscopy</i> , 2021 , 220, 113152	3.1	1
574	Engineering a Robust Flat Band in III-V Semiconductor Heterostructures. <i>Nano Letters</i> , 2021 , 21, 680-685	11.5	3
573	Efficient Electrical Transport Through Oxide-Mediated InP-on-Si Hybrid Interfaces Bonded at 300 °C. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2021 , 218, 2000317	1.6	
572	Topological surface states in epitaxial (SnBi ₂ Te ₄) _n (Bi ₂ Te ₃) _m natural van der Waals superlattices. <i>Physical Review Materials</i> , 2021 , 5,	3.2	3
571	Metal-organic framework/graphene oxide composites for CO ₂ capture by microwave swing adsorption. <i>Journal of Materials Chemistry A</i> , 2021 , 9, 13135-13142	13	6
570	Development of a cryogenic indentation tool with in situ optical observation, application to the mechanical characterization of III-V semiconductors. <i>Semiconductor Science and Technology</i> , 2021 , 36, 035015	1.8	0
569	Interdiffusion of Al and Ga in AlN/AlGa _N superlattices grown by ammonia-assisted molecular beam epitaxy. <i>Superlattices and Microstructures</i> , 2021 , 150, 106801	2.8	2
568	Strain, magnetic anisotropy, and composition modulation in hybrid metal-oxide vertically assembled nanocomposites. <i>MRS Bulletin</i> , 2021 , 46, 136-141	3.2	2
567	Electronic band gap of van der Waals As ₂ Te ₃ crystals. <i>Applied Physics Letters</i> , 2021 , 119, 043103	3.4	0
566	Selective target protein detection using a decorated nanopore into a microfluidic device. <i>Biosensors and Bioelectronics</i> , 2021 , 183, 113195	11.8	6
565	Dynamics of Droplet Consumption in Vapor-Liquid-Solid III-V Nanowire Growth. <i>Crystal Growth and Design</i> , 2021 , 21, 4647-4655	3.5	1
564	Single-Electron Tunneling PbS/InP Heterostructure Nanoplatelets for Synaptic Operations. <i>ACS Applied Materials & Interfaces</i> , 2021 , 13, 38450-38457	9.5	1
563	Monodispersed MOF-808 Nanocrystals Synthesized via a Scalable Room-Temperature Approach for Efficient Heterogeneous Peptide Bond Hydrolysis. <i>Chemistry of Materials</i> , 2021 , 33, 7057-7066	9.6	9
562	Relaxation mechanism of GaP grown on 001 Si substrates: influence of defects on the growth of AlGaP layers on GaP/Si templates. <i>Philosophical Magazine</i> , 2021 , 101, 2189-2199	1.6	
561	Highly linear polarized emission at telecom bands in InAs/InP quantum dot-nanowires by geometry tailoring. <i>Nanoscale</i> , 2021 , 13, 16952-16958	7.7	
560	Effect of sintering germanium epilayers on dislocation dynamics: From theory to experimental observation. <i>Acta Materialia</i> , 2020 , 200, 608-618	8.4	1
559	Why is it difficult to grow spontaneous ZnO nanowires using molecular beam epitaxy?. <i>Nanotechnology</i> , 2020 , 31, 385601	3.4	1

558	Crystal phase engineering of self-catalyzed GaAs nanowires using a RHEED diagram. <i>Nanoscale Advances</i> , 2020 , 2, 2127-2134	5.1	6
557	Measuring the surface bonding energy: A comparison between the classical double-cantilever beam experiment and its nanoscale analog. <i>AIP Advances</i> , 2020 , 10, 045006	1.5	0
556	Ultra-low-threshold continuous-wave and pulsed lasing in tensile-strained GeSn alloys. <i>Nature Photonics</i> , 2020 , 14, 375-382	33.9	81
555	Encapsulation of Microperoxidase-8 in MIL-101(Cr)-X Nanoparticles: Influence of Metal-Organic Framework Functionalization on Enzymatic Immobilization and Catalytic Activity. <i>ACS Applied Nano Materials</i> , 2020 , 3, 3233-3243	5.6	10
554	Phase Selection in Self-catalyzed GaAs Nanowires. <i>Nano Letters</i> , 2020 , 20, 1669-1675	11.5	49
553	Pushing Absorption of Perovskite Nanocrystals into the Infrared. <i>Nano Letters</i> , 2020 , 20, 3999-4006	11.5	11
552	Zinc-blende group III-V/group IV epitaxy: Importance of the miscut. <i>Physical Review Materials</i> , 2020 , 4,	3.2	14
551	Structural, vibrational, and magnetic properties of self-assembled CoPt nanoalloys embedded in SrTiO ₃ . <i>Physical Review Materials</i> , 2020 , 4,	3.2	1
550	3.3 μ m interband-cascade resonant-cavity light-emitting diode with narrow spectral emission linewidth. <i>Semiconductor Science and Technology</i> , 2020 , 35, 125029	1.8	1
549	Efficient incorporation and protection of lansoprazole in cyclodextrin metal-organic frameworks. <i>International Journal of Pharmaceutics</i> , 2020 , 585, 119442	6.5	4
548	Single crystalline boron rich B(Al)N alloys grown by MOVPE. <i>Applied Physics Letters</i> , 2020 , 116, 042101	3.4	7
547	Engineering dislocations and nanovoids for high-efficiency III-V photovoltaic cells on silicon 2020 ,		1
546	Density-controlled growth of vertical InP nanowires on Si(111) substrates. <i>Nanotechnology</i> , 2020 , 31, 354003	3.4	2
545	Gate length dependent transport properties of in-plane core-shell nanowires with raised contacts. <i>Nano Research</i> , 2020 , 13, 61-66	10	1
544	Nanoscale electrical analyses of axial-junction GaAsP nanowires for solar cell applications. <i>Nanotechnology</i> , 2020 , 31, 145708	3.4	9
543	Microstructure of GaAs thin films grown on glass using Ge seed layers fabricated by aluminium induced crystallization. <i>Thin Solid Films</i> , 2020 , 694, 137737	2.2	3
542	Control of the Mechanical Adhesion of III-V Materials Grown on Layered h-BN. <i>ACS Applied Materials & Interfaces</i> , 2020 , 12, 55460-55466	9.5	4
541	Reduced Lasing Thresholds in GeSn Microdisk Cavities with Defect Management of the Optically Active Region. <i>ACS Photonics</i> , 2020 , 7, 2713-2722	6.3	19

540	Highly Ordered Boron Nitride/Epigraphene Epitaxial Films on Silicon Carbide by Lateral Epitaxial Deposition. <i>ACS Nano</i> , 2020 , 14, 12962-12971	16.7	5
539	Stable and high yield growth of GaP and InGaAs nanowire arrays using In as a catalyst. <i>Nanoscale</i> , 2020 , 12, 18240-18248	7.7	4
538	Effectiveness of selective area growth using van der Waals h-BN layer for crack-free transfer of large-size III-N devices onto arbitrary substrates. <i>Scientific Reports</i> , 2020 , 10, 21709	4.9	6
537	Effects of nitrogen incorporation and thermal annealing on the optical and spin properties of GaPN dilute nitride alloys. <i>Journal of Alloys and Compounds</i> , 2020 , 814, 152233	5.7	3
536	Molecular-beam epitaxy of GaSb on 6°-offcut (0 0 1) Si using a GaAs nucleation layer. <i>Journal of Crystal Growth</i> , 2020 , 529, 125299	1.6	3
535	Uprooting defects to enable high-performance III-V optoelectronic devices on silicon. <i>Nature Communications</i> , 2019 , 10, 4322	17.4	27
534	Physical mechanisms involved in the formation and operation of memory devices based on a monolayer of gold nanoparticle-polythiophene hybrid materials. <i>Nanoscale Advances</i> , 2019 , 1, 2718-2726	5.1	3
533	Large-Area van der Waals Epitaxial Growth of Vertical III-Nitride Nanodevice Structures on Layered Boron Nitride. <i>Advanced Materials Interfaces</i> , 2019 , 6, 1900207	4.6	9
532	GaAs (1 1 1) epilayers grown by MBE on Ge (1 1 1): Twin reduction and polarity. <i>Journal of Crystal Growth</i> , 2019 , 519, 84-90	1.6	8
531	Importance of point defect reactions for the atomic-scale roughness of III-V nanowire sidewalls. <i>Nanotechnology</i> , 2019 , 30, 324002	3.4	2
530	Evidence and control of unintentional As-rich shells in GaAs P nanowires. <i>Nanotechnology</i> , 2019 , 30, 294003	3.4	4
529	Controlled Dislocations Injection in N/P Hg _{1-x} Cd _x Te Photodiodes by Indentations. <i>Journal of Electronic Materials</i> , 2019 , 48, 6108-6112	1.9	
528	Correlated optical and structural analyses of individual GaAsP/GaP core-shell nanowires. <i>Nanotechnology</i> , 2019 , 30, 304001	3.4	3
527	Trap-Free Heterostructure of PbS Nanoplatelets on InP(001) by Chemical Epitaxy. <i>ACS Nano</i> , 2019 , 13, 1961-1967	16.7	6
526	Selective area molecular beam epitaxy of InSb nanostructures on mismatched substrates. <i>Journal of Crystal Growth</i> , 2019 , 512, 6-10	1.6	8
525	Composition and Face Polarity Influences on Mechanical Properties of (111) Cd _{1-x} Zn _x Te Determined by Indentation. <i>Journal of Electronic Materials</i> , 2019 , 48, 6985-6990	1.9	1
524	Evidence for a narrow band gap phase in 1T' WS ₂ nanosheet. <i>Applied Physics Letters</i> , 2019 , 115, 032102	3.4	16
523	Voided Ge/Si Platform to Integrate III-V Materials on Si. <i>ECS Transactions</i> , 2019 , 93, 81-85	1	2

522	Phase separation and surface segregation in Co _{0.5} Au _{0.5} BrTiO ₃ thin films: Self-assembly of bilayered epitaxial nanocolumnar composites. <i>Physical Review Materials</i> , 2019 , 3,	3.2	3
521	A study of the strain distribution by scanning X-ray diffraction on GaP/Si for III-V monolithic integration on silicon. <i>Journal of Applied Crystallography</i> , 2019 , 52, 809-815	3.8	2
520	A porous Ge/Si interface layer for defect-free III-V multi-junction solar cells on silicon 2019 ,		3
519	Heteroepitaxial growth of silicon on GaAs via low-temperature plasma-enhanced chemical vapor deposition 2019 ,		2
518	Polarization- and diffraction-controlled second-harmonic generation from semiconductor metasurfaces. <i>Journal of the Optical Society of America B: Optical Physics</i> , 2019 , 36, E55	1.7	15
517	InAs quantum dot in a needlelike tapered InP nanowire: a telecom band single photon source monolithically grown on silicon. <i>Nanoscale</i> , 2019 , 11, 21847-21855	7.7	10
516	Wafer-scale MOVPE growth and characterization of highly ordered h-BN on patterned sapphire substrates. <i>Journal of Crystal Growth</i> , 2019 , 509, 40-43	1.6	9
515	InAs/GaSb thin layers directly grown on nominal (0 0 1)-Si substrate by MOVPE for the fabrication of InAs FINFET. <i>Journal of Crystal Growth</i> , 2019 , 510, 18-22	1.6	1
514	Development of reflective back contacts for high-efficiency ultrathin Cu(In,Ga)Se ₂ solar cells. <i>Thin Solid Films</i> , 2019 , 672, 1-6	2.2	14
513	MOVPE van der Waals epitaxial growth of AlGaIn/AlGaIn multiple quantum well structures with deep UV emission on large scale 2D h-BN buffered sapphire substrates. <i>Journal of Crystal Growth</i> , 2019 , 507, 352-356	1.6	5
512	Growth optimization and characterization of regular arrays of GaAs/AlGaAs core/shell nanowires for tandem solar cells on silicon. <i>Nanotechnology</i> , 2019 , 30, 084005	3.4	11
511	High structural and optical quality of III-V-on-Si 1.2 nm-thick oxide-bonded hybrid interface. <i>Microelectronic Engineering</i> , 2018 , 192, 25-29	2.5	1
510	Determination of the spin orbit coupling and crystal field splitting in wurtzite InP by polarization resolved photoluminescence. <i>Applied Physics Letters</i> , 2018 , 112, 071903	3.4	3
509	Measuring and Modeling the Growth Dynamics of Self-Catalyzed GaP Nanowire Arrays. <i>Nano Letters</i> , 2018 , 18, 701-708	11.5	35
508	Shear-driven phase transformation in silicon nanowires. <i>Nanotechnology</i> , 2018 , 29, 125601	3.4	21
507	Biomimetic ion channels formation by emulsion based on chemically modified cyclodextrin nanotubes. <i>Faraday Discussions</i> , 2018 , 210, 41-54	3.6	6
506	Versatile cyclodextrin nanotube synthesis with functional anchors for efficient ion channel formation: design, characterization and ion conductance. <i>Nanoscale</i> , 2018 , 10, 15303-15316	7.7	7
505	Impact of the sequence of precursor introduction on the growth and properties of atomic layer deposited Al-doped ZnO films. <i>Journal of Vacuum Science and Technology A: Vacuum, Surfaces and Films</i> , 2018 , 36, 041502	2.9	6

504	Quantum cascade lasers grown on silicon. <i>Scientific Reports</i> , 2018 , 8, 7206	4.9	41
503	Universal description of III-V/Si epitaxial growth processes. <i>Physical Review Materials</i> , 2018 , 2,	3.2	30
502	Chemical nature of the anion antisite in dilute phosphide GaAs _{1-x} P _x alloy grown at low temperature. <i>Physical Review Materials</i> , 2018 , 2,	3.2	1
501	Ultrathin Ni nanowires embedded in SrTiO ₃ : Vertical epitaxy, strain relaxation mechanisms, and solid-state amorphization. <i>Physical Review Materials</i> , 2018 , 2,	3.2	13
500	Atomic scale analyses of {111}Z-module defects in an NiZr alloy. <i>Acta Crystallographica Section A: Foundations and Advances</i> , 2018 , 74, 647-658	1.7	2
499	Determination of the polarity of the GaAs (001) rosette arms by convergent beam electron diffraction 2018 , 445-448		
498	Large angle twist-bonded compliant substrates for the epitaxy of lattice mismatched III-V semiconductors 2018 , 193-196		
497	Interface energy analysis of III-V islands on Si (001) in the Volmer-Weber growth mode. <i>Applied Physics Letters</i> , 2018 , 113, 191601	3.4	9
496	Nanoscale investigation of a radial p-n junction in self-catalyzed GaAs nanowires grown on Si (111). <i>Nanoscale</i> , 2018 , 10, 20207-20217	7.7	9
495	Solid-State Nanopore Easy Chip Integration in a Cheap and Reusable Microfluidic Device for Ion Transport and Polymer Conformation Sensing. <i>ACS Sensors</i> , 2018 , 3, 2129-2137	9.2	16
494	Atomic Step Flow on a Nanofacet. <i>Physical Review Letters</i> , 2018 , 121, 166101	7.4	82
493	A Stress-Free and Textured GaP Template on Silicon for Solar Water Splitting. <i>Advanced Functional Materials</i> , 2018 , 28, 1801585	15.6	11
492	Wave-Function Engineering in HgSe/HgTe Colloidal Heterostructures To Enhance Mid-infrared Photoconductive Properties. <i>Nano Letters</i> , 2018 , 18, 4590-4597	11.5	19
491	Coupled HgSe Colloidal Quantum Wells through a Tunable Barrier: A Strategy To Uncouple Optical and Transport Band Gap. <i>Chemistry of Materials</i> , 2018 , 30, 4065-4072	9.6	23
490	In-plane InSb nanowires grown by selective area molecular beam epitaxy on semi-insulating substrate. <i>Nanotechnology</i> , 2018 , 29, 305705	3.4	12
489	Threading dislocation free GaSb nanotemplates grown by selective molecular beam epitaxy on GaAs (001) for in-plane InAs nanowire integration. <i>Journal of Crystal Growth</i> , 2017 , 477, 45-49	1.6	9
488	Nanoselective area growth of defect-free thick indium-rich InGaN nanostructures on sacrificial ZnO templates. <i>Nanotechnology</i> , 2017 , 28, 195304	3.4	1
487	Characterization of antimonide based material grown by molecular epitaxy on vicinal silicon substrates via a low temperature AlSb nucleation layer. <i>Journal of Crystal Growth</i> , 2017 , 477, 65-71	1.6	10

486	Flexible metal-semiconductor-metal device prototype on wafer-scale thick boron nitride layers grown by MOVPE. <i>Scientific Reports</i> , 2017 , 7, 786	4.9	35
485	Morphology and valence band offset of GaSb quantum dots grown on GaP(001) and their evolution upon capping. <i>Nanotechnology</i> , 2017 , 28, 225601	3.4	6
484	. <i>IEEE Photonics Journal</i> , 2017 , 9, 1-7	1.8	14
483	In Situ Optical Monitoring of New Pathways in the Metal-Induced Crystallization of Amorphous Ge. <i>Crystal Growth and Design</i> , 2017 , 17, 5783-5789	3.5	5
482	In situ passivation of GaAsP nanowires. <i>Nanotechnology</i> , 2017 , 28, 495707	3.4	18
481	Electronic properties of (Sb;Bi)Te colloidal heterostructured nanoplates down to the single particle level. <i>Scientific Reports</i> , 2017 , 7, 9647	4.9	4
480	Emission wavelength red-shift by using Bemi-bulkInGaN buffer layer in InGaN/InGaN multiple-quantum-well. <i>Superlattices and Microstructures</i> , 2017 , 112, 279-286	2.8	5
479	Surface effects on exciton diffusion in non polar ZnO/ZnMgO heterostructures. <i>Journal of Physics Condensed Matter</i> , 2017 , 29, 485706	1.8	2
478	Functionalized Solid-State Nanopore Integrated in a Reusable Microfluidic Device for a Better Stability and Nanoparticle Detection. <i>ACS Applied Materials & Interfaces</i> , 2017 , 9, 41634-41640	9.5	33
477	Gas sensors boosted by two-dimensional h-BN enabled transfer on thin substrate foils: towards wearable and portable applications. <i>Scientific Reports</i> , 2017 , 7, 15212	4.9	41
476	Enhanced sputtering of Ge nanowires under synergetic effect of Mn ion and electron beams. <i>Results in Physics</i> , 2017 , 7, 3813-3814	3.7	
475	Study of the nucleation and growth of InP nanowires on silicon with gold-indium catalyst. <i>Journal of Crystal Growth</i> , 2017 , 458, 96-102	1.6	7
474	Improving InGaN heterojunction solar cells efficiency using a semibulk absorber. <i>Solar Energy Materials and Solar Cells</i> , 2017 , 159, 405-411	6.4	17
473	Mask effect in nano-selective- area-growth by MOCVD on thickness enhancement, indium incorporation, and emission of InGaN nanostructures on AlN-buffered Si(111) substrates. <i>Optical Materials Express</i> , 2017 , 7, 376	2.6	3
472	Low-loss orientation-patterned GaSb waveguides for mid-infrared parametric conversion. <i>Optical Materials Express</i> , 2017 , 7, 3011	2.6	11
471	Lazarevicite-type short-range ordering in ternary III-V nanowires. <i>Physical Review B</i> , 2016 , 94,	3.3	6
470	Selective CO ₂ methanation on Ru/TiO ₂ catalysts: unravelling the decisive role of the TiO ₂ support crystal structure. <i>Catalysis Science and Technology</i> , 2016 , 6, 8117-8128	5.5	54
469	Mechanistic Insight and Optimization of InP Nanocrystals Synthesized with Aminophosphines. <i>Chemistry of Materials</i> , 2016 , 28, 5925-5934	9.6	74

468	Band Alignment and Minigaps in Monolayer MoS ₂ -Graphene van der Waals Heterostructures. <i>Nano Letters</i> , 2016 , 16, 4054-61	11.5	230
467	Sub-nanometrically resolved chemical mappings of quantum-cascade laser active regions. <i>Semiconductor Science and Technology</i> , 2016 , 31, 055017	1.8	5
466	Metallic Functionalization of CdSe 2D Nanoplatelets and Its Impact on Electronic Transport. <i>Journal of Physical Chemistry C</i> , 2016 , 120, 12351-12361	3.8	26
465	Nondestructive Characterization of Residual Threading Dislocation Density in HgCdTe Layers Grown on CdZnTe by Liquid-Phase Epitaxy. <i>Journal of Electronic Materials</i> , 2016 , 45, 4518-4523	1.9	3
464	An ultra-thin SiO ₂ ALD layer for void-free bonding of III-V material on silicon. <i>Microelectronic Engineering</i> , 2016 , 162, 40-44	2.5	4
463	Infrared Photodetection Based on Colloidal Quantum-Dot Films with High Mobility and Optical Absorption up to THz. <i>Nano Letters</i> , 2016 , 16, 1282-6	11.5	119
462	Locally measuring the adhesion of InP directly bonded on sub-100 nm patterned Si. <i>Nanotechnology</i> , 2016 , 27, 115707	3.4	3
461	Sharpening the Interfaces of Axial Heterostructures in Self-Catalyzed AlGaAs Nanowires: Experiment and Theory. <i>Nano Letters</i> , 2016 , 16, 1917-24	11.5	41
460	Chemical lift-off and direct wafer bonding of GaN/InGaN PIN structures grown on ZnO. <i>Journal of Crystal Growth</i> , 2016 , 435, 105-109	1.6	2
459	Effect of Dot-Height Truncation on the Device Performance of Multilayer InAs/GaAs Quantum Dot Solar Cells. <i>IEEE Journal of Photovoltaics</i> , 2016 , 6, 584-589	3.7	3
458	Photon Cascade from a Single Crystal Phase Nanowire Quantum Dot. <i>Nano Letters</i> , 2016 , 16, 1081-5	11.5	28
457	Quantification of the HAADF contrast from the nanometer scale down to the single atomic column: application to quantum cascade lasers 2016 , 572-573		
456	Colloidal Quantum-Dot Heterostructures Studied Using Aberration-Corrected Scanning Transmission Electron Microscopy 2016 , 498-499		
455	Ultrathin PECVD epitaxial Si solar cells on glass via low-temperature transfer process. <i>Progress in Photovoltaics: Research and Applications</i> , 2016 , 24, 1075-1084	6.8	24
454	Wet-Route Synthesis and Characterization of Yb:CaF ₂ Optical Ceramics. <i>Journal of the American Ceramic Society</i> , 2016 , 99, 1992-2000	3.8	31
453	Synthesis of In _{0.1} Ga _{0.9} N/GaN structures grown by MOCVD and MBE for high speed optoelectronics. <i>MRS Advances</i> , 2016 , 1, 1735-1742	0.7	4
452	Selective area heteroepitaxy of GaSb on GaAs (001) for in-plane InAs nanowire achievement. <i>Nanotechnology</i> , 2016 , 27, 505301	3.4	23
451	Nanoparticle Electrical Analysis and Detection with a Solid-state Nanopore in a Microfluidic Device. <i>Procedia Engineering</i> , 2016 , 168, 1475-1478		3

450	Probing the electronic properties of CVD graphene superlattices 2016 ,		1
449	Nanoselective area growth of GaN by metalorganic vapor phase epitaxy on 4H-SiC using epitaxial graphene as a mask. <i>Applied Physics Letters</i> , 2016 , 108, 103105	3.4	9
448	New insights into the Mo/Cu(In,Ga)Se interface in thin film solar cells: Formation and properties of the MoSe interfacial layer. <i>Journal of Chemical Physics</i> , 2016 , 145, 154702	3.9	25
447	Role of V-pits in the performance improvement of InGaN solar cells. <i>Applied Physics Letters</i> , 2016 , 109, 133507	3.4	6
446	Low temperature plasma enhanced CVD epitaxial growth of silicon on GaAs: a new paradigm for III-V/Si integration. <i>Scientific Reports</i> , 2016 , 6, 25674	4.9	16
445	High reflectance dielectric distributed Bragg reflectors for near ultra-violet planar microcavities: SiO ₂ /HfO ₂ versus SiO ₂ /SiN _x . <i>Journal of Applied Physics</i> , 2016 , 120, 093107	2.5	3
444	Local probing of the interfacial strength in InP/Si substructures. <i>MRS Advances</i> , 2016 , 1, 779-784	0.7	
443	Single-crystal nanopyramidal B _{0.7} GaN by nanoselective area growth on AlN/Si(111) and GaN templates. <i>Nanotechnology</i> , 2016 , 27, 115602	3.4	2
442	Pressure-Dependent Photoluminescence Study of Wurtzite InP Nanowires. <i>Nano Letters</i> , 2016 , 16, 2926-2935	10.5	20
441	Large-Area Two-Dimensional Layered Hexagonal Boron Nitride Grown on Sapphire by Metalorganic Vapor Phase Epitaxy. <i>Crystal Growth and Design</i> , 2016 , 16, 3409-3415	3.5	81
440	First orientation-patterned GaSb ridge waveguides fabrication and preliminary characterization for frequency conversion in the mid-infrared 2016 ,		1
439	(Invited) Locally Measuring the Adhesion of InP Membranes Directly Bonded on Silicon. <i>ECS Transactions</i> , 2016 , 75, 169-176	1	
438	van der Waals Epitaxy of GaSe/Graphene Heterostructure: Electronic and Interfacial Properties. <i>ACS Nano</i> , 2016 , 10, 9679-9686	16.7	113
437	Abrupt GaP/GaAs Interfaces in Self-Catalyzed Nanowires. <i>Nano Letters</i> , 2015 , 15, 6036-41	11.5	42
436	Quantitative evaluation of microtwins and antiphase defects in GaP/Si nanolayers for a III-V photonics platform on silicon using a laboratory X-ray diffraction setup. <i>Journal of Applied Crystallography</i> , 2015 , 48, 702-710	3.8	12
435	Evidence for Flat Bands near the Fermi Level in Epitaxial Rhombohedral Multilayer Graphene. <i>ACS Nano</i> , 2015 , 9, 5432-9	16.7	69
434	Nanoscale elemental quantification in heterostructured SiGe nanowires. <i>Nanoscale</i> , 2015 , 7, 8544-53	7.7	6
433	Crystallization of Si Templates of Controlled Shape, Size, and Orientation: Toward Micro- and Nanosubstrates. <i>Crystal Growth and Design</i> , 2015 , 15, 2102-2109	3.5	3

432	AlGaIn-based MQWs grown on a thick relaxed AlGaIn buffer on AlN templates emitting at 285 nm. <i>Optical Materials Express</i> , 2015 , 5, 380	2.6	26
431	Structural and optical investigations of AlGaIn MQWs grown on a relaxed AlGaIn buffer on AlN templates for emission at 280 nm. <i>Journal of Crystal Growth</i> , 2015 , 432, 37-44	1.6	5
430	Biomimetic Nanotubes Based on Cyclodextrins for Ion-Channel Applications. <i>Nano Letters</i> , 2015 , 15, 7748-7754	4.5	27
429	Nonstoichiometric Low-Temperature Grown GaAs Nanowires. <i>Nano Letters</i> , 2015 , 15, 6440-5	11.5	8
428	Nanostructure and luminescence properties of amorphous and crystalline yttrium/aluminum oxide thin films obtained with pulsed reactive crossed-beam deposition. <i>Journal of Materials Science</i> , 2015 , 50, 1267-1276	4.3	2
427	ZnS anisotropic nanocrystals using a one-pot low temperature synthesis. <i>New Journal of Chemistry</i> , 2015 , 39, 90-93	3.6	6
426	Interplay between tightly focused excitation and ballistic propagation of polariton condensates in a ZnO microcavity. <i>Physical Review B</i> , 2015 , 92,	3.3	6
425	Nondestructive three-dimensional imaging of crystal strain and rotations in an extended bonded semiconductor heterostructure. <i>Physical Review B</i> , 2015 , 92,	3.3	17
424	Atomically Sharp Interface in an h-BN-epitaxial graphene van der Waals Heterostructure. <i>Scientific Reports</i> , 2015 , 5, 16465	4.9	50
423	Strain in a silicon-on-insulator nanostructure revealed by 3D x-ray Bragg ptychography. <i>Scientific Reports</i> , 2015 , 5, 9827	4.9	44
422	Nanoselective area growth and characterization of dislocation-free InGaIn nanopillars on AlN buffered Si(111) templates. <i>Applied Physics Letters</i> , 2015 , 107, 113105	3.4	13
421	Type I band alignment in GaAs ₈₁ Sb ₁₉ /GaAs core-shell nanowires. <i>Applied Physics Letters</i> , 2015 , 107, 112102	3.4	13
420	Abrupt GaP/Si hetero-interface using birstepped Si buffer. <i>Applied Physics Letters</i> , 2015 , 107, 191603	3.4	16
419	High quality thick InGaIn nanostructures grown by nanoselective area growth for new generation photovoltaic devices. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2015 , 212, 740-744	1.6	7
418	BAIn thin layers for deep UV applications. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2015 , 212, 745-750	1.6	30
417	Optical polarization properties of InAs/InP quantum dot and quantum rod nanowires. <i>Nanotechnology</i> , 2015 , 26, 395701	3.4	11
416	Towards InAs/InGaAs/GaAs Quantum Dot Solar Cells Directly Grown on Si Substrate. <i>Materials</i> , 2015 , 8, 4544-4552	3.5	9
415	Oxide-Free Bonding of III-V-Based Material on Silicon and Nano-Structuration of the Hybrid Waveguide for Advanced Optical Functions. <i>Photonics</i> , 2015 , 2, 1054-1064	2.2	4

414	Gradient CdSe/CdS Quantum Dots with Room Temperature Biexciton Unity Quantum Yield. <i>Nano Letters</i> , 2015 , 15, 3953-8	11.5	115
413	GaSb-based composite quantum wells for laser diodes operating in the telecom wavelength range near 1.55- μ m. <i>Applied Physics Letters</i> , 2015 , 106, 101102	3.4	11
412	Interface Intermixing in Type II InAs/GaInAsSb Quantum Wells Designed for Active Regions of Mid-Infrared-Emitting Interband Cascade Lasers. <i>Nanoscale Research Letters</i> , 2015 , 10, 471	5	7
411	Silicon surface preparation for III-V molecular beam epitaxy. <i>Journal of Crystal Growth</i> , 2015 , 413, 17-24	1.6	22
410	Microstructural and electrical investigation of Pd/Au ohmic contact on p-GaN. <i>Journal of Vacuum Science and Technology B: Nanotechnology and Microelectronics</i> , 2015 , 33, 010603	1.3	12
409	Simultaneous growth of GaN/AlGaN quantum wells on c-, a-, m-, and (20.1)-plane GaN bulk substrates obtained by the ammonothermal method: Structural studies. <i>Journal of Crystal Growth</i> , 2015 , 414, 87-93	1.6	2
408	Role of compositional fluctuations and their suppression on the strain and luminescence of InGaN alloys. <i>Journal of Applied Physics</i> , 2015 , 117, 055705	2.5	19
407	Crystal growth of bullet-shaped magnetite in magnetotactic bacteria of the Nitrospirae phylum. <i>Journal of the Royal Society Interface</i> , 2015 , 12,	4.1	38
406	Recent advances in development of vertical-cavity based short pulse source at 1.55 μ m. <i>Frontiers of Optoelectronics</i> , 2014 , 7, 1-19	2.8	0
405	Control of the interfacial abruptness of Au-catalyzed Si-Si _{1-x} Ge _x heterostructured nanowires grown by vapor-liquid-solid. <i>Journal of Vacuum Science and Technology A: Vacuum, Surfaces and Films</i> , 2014 , 32, 031101	2.9	4
404	Electrolyte-gated field effect transistor to probe the surface defects and morphology in films of thick CdSe colloidal nanoplatelets. <i>ACS Nano</i> , 2014 , 8, 3813-20	16.7	57
403	Efficient exciton concentrators built from colloidal core/crown CdSe/CdS semiconductor nanoplatelets. <i>Nano Letters</i> , 2014 , 14, 207-13	11.5	185
402	Type-II CdSe/CdTe core/crown semiconductor nanoplatelets. <i>Journal of the American Chemical Society</i> , 2014 , 136, 16430-8	16.4	124
401	Highly crystalline urchin-like structures made of ultra-thin zinc oxide nanowires. <i>RSC Advances</i> , 2014 , 4, 47234-47239	3.7	29
400	Incorporation and redistribution of impurities into silicon nanowires during metal-particle-assisted growth. <i>Nature Communications</i> , 2014 , 5, 4134	17.4	83
399	Catalyst faceting during graphene layer crystallization in the course of carbon nanofiber growth. <i>Carbon</i> , 2014 , 79, 93-102	10.4	4
398	Dual light-emitting nanoparticles: second harmonic generation combined with rare-earth photoluminescence. <i>Journal of Materials Chemistry C</i> , 2014 , 2, 7681-7686	7.1	11
397	Composition-dependent interfacial abruptness in Au-catalyzed Si(1-x)Ge(x)/Si/Si(1-x)Ge(x) nanowire heterostructures. <i>Nano Letters</i> , 2014 , 14, 5140-7	11.5	31

396	Carbon nanotube translocation to distant organs after pulmonary exposure: insights from in situ (14)C-radiolabeling and tissue radioimaging. <i>ACS Nano</i> , 2014 , 8, 5715-24	16.7	66
395	Novel heterostructured Ge nanowires based on polytype transformation. <i>Nano Letters</i> , 2014 , 14, 4828-36	1.5	52
394	Synthesis of Zinc and Lead Chalcogenide Core and Core/Shell Nanoplatelets Using Sequential Cation Exchange Reactions. <i>Chemistry of Materials</i> , 2014 , 26, 3002-3008	9.6	70
393	Single step fabrication of N-doped graphene/Si ₃ N ₄ /SiC heterostructures. <i>Nano Research</i> , 2014 , 7, 835-843	13	14
392	Silicon-Microtube Scaffold Decorated with Anatase TiO ₂ as a Negative Electrode for a 3D Lithium-Ion Microbattery. <i>Advanced Energy Materials</i> , 2014 , 4, 1301612	21.8	53
391	FIB patterning of dielectric, metallized and graphene membranes: A comparative study. <i>Microelectronic Engineering</i> , 2014 , 121, 87-91	2.5	22
390	Investigation on Mn doping of Ge nanowires for spintronics. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2014 , 11, 315-319		2
389	Multicharacterization approach for studying InAl(Ga)N/Al(Ga)N/GaN heterostructures for high electron mobility transistors. <i>AIP Advances</i> , 2014 , 4, 127101	1.5	13
388	Instrumented nanoindentation and scanning electron transmission microscopy applied to the study of the adhesion of InP membranes heteroepitaxially bonded to Si. <i>EPJ Applied Physics</i> , 2014 , 65, 20702	1.1	2
387	High performance TiN gate contact on AlGaIn/GaN transistor using a mechanically strain induced P-doping. <i>Applied Physics Letters</i> , 2014 , 104, 233506	3.4	10
386	Nanoscale Surface and Sub-Surface Chemical Analysis of SiGe Nanowires. <i>Microscopy and Microanalysis</i> , 2014 , 20, 2052-2053	0.5	1
385	Bonding mechanism of a yttrium iron garnet film on Si without the use of an intermediate layer. <i>Applied Physics Letters</i> , 2014 , 105, 141601	3.4	3
384	Aberration corrected STEM to study an ancient hair dyeing formula 2014 ,		2
383	Void-free direct bonding of InP to Si: Advantages of low H-content and ozone activation. <i>Journal of Vacuum Science and Technology B: Nanotechnology and Microelectronics</i> , 2014 , 32, 021201	1.3	7
382	Nanoscale selective area growth of thick, dense, uniform, In-rich, InGaIn nanostructure arrays on GaN/sapphire template. <i>Journal of Applied Physics</i> , 2014 , 116, 163105	2.5	15
381	Piezoelectric effect in InAs/InP quantum rod nanowires grown on silicon substrate. <i>Applied Physics Letters</i> , 2014 , 104, 183101	3.4	6
380	Random stacking sequences in III-V nanowires are correlated. <i>Physical Review B</i> , 2014 , 89,	3.3	13
379	Interfacial abruptness in axial Si/SiGe heterostructures in nanowires probed by scanning capacitance microscopy. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2014 , 211, 509-513	1.6	4

- 378 Control of heterointerface and strain mapping in Au catalyzed axial Si-Si_{1-x}Ge_x nanowires. *Materials Research Society Symposia Proceedings*, **2014**, 1707, 37
- 377 Wafer bonding of Si for hybrid photonic devices. *Materials Research Society Symposia Proceedings*, **2014**, 1748, 1
- 376 Plasticity and Fracture of InP/Si Substructures. *Materials Science Forum*, **2014**, 783-786, 1628-1633 0.4
- 375 Multifunctional hybrid silica nanoparticles based on [MoBr₄]³⁻ phosphorescent nanosized clusters, magnetic Fe₃O₄ and plasmonic gold nanoparticles. *Journal of Colloid and Interface Science*, **2014**, 424, 132-40 9.3 22
- 374 Characteristics of HgS nanoparticles formed in hair by a chemical reaction. *Philosophical Magazine*, **2013**, 93, 137-151 1.6 5
- 373 Quantum efficiency of InAs/InP nanowire heterostructures grown on silicon substrates. *Physica Status Solidi - Rapid Research Letters*, **2013**, 7, 878-881 2.5
- 372 Resonant TE Transmission Through a Continuous Metal Film: Perspectives for Low-Loss Plasmonic Elements. *Plasmonics*, **2013**, 8, 829-833 2.4 2
- 371 Structural and photoluminescence studies of highly crystalline un-annealed ZnO nanorods arrays synthesized by hydrothermal technique. *Journal of Luminescence*, **2013**, 144, 234-240 3.8 5
- 370 Influence of catalyst droplet diameter on the growth direction of InP nanowires grown on Si(001) substrate. *Applied Physics Letters*, **2013**, 102, 243113 3.4 7
- 369 Structural and compositional characterization of MOVPE GaN thin films transferred from sapphire to glass substrates using chemical lift-off and room temperature direct wafer bonding and GaN wafer scale MOVPE growth on ZnO-buffered sapphire. *Journal of Crystal Growth*, **2013**, 370, 63-67 1.6 42
- 368 Multilayered InGa_N/Ga_N structure vs. single InGa_N layer for solar cell applications: A comparative study. *Acta Materialia*, **2013**, 61, 6587-6596 8.4 35
- 367 Structure and Magnetism of Orthorhombic Epitaxial FeMnAs. *Crystal Growth and Design*, **2013**, 13, 4279-4284 3.5 2
- 366 Phase coherent transport in GaAs/AlGaAs core-shell nanowires. *Journal of Crystal Growth*, **2013**, 378, 546-548 1.6 6
- 365 Suppression of crack generation in AlGa_N/Ga_N distributed Bragg reflectors grown by MOVPE. *Journal of Crystal Growth*, **2013**, 370, 12-15 1.6 12
- 364 Semibulk InGa_N: A novel approach for thick, single phase, epitaxial InGa_N layers grown by MOVPE. *Journal of Crystal Growth*, **2013**, 370, 57-62 1.6 41
- 363 From excitonic to photonic polariton condensate in a ZnO-based microcavity. *Physical Review Letters*, **2013**, 110, 196406 7.4 136
- 362 Fabrication and characterization of a room-temperature ZnO polariton laser. *Applied Physics Letters*, **2013**, 102, 191118 3.4 41
- 361 Growth of vertical GaAs nanowires on an amorphous substrate via a fiber-textured Si platform. *Nano Letters*, **2013**, 13, 2743-7 11.5 29

360	Polarization properties of single and ensembles of InAs/InP quantum rod nanowires emitting in the telecom wavelengths. <i>Journal of Applied Physics</i> , 2013 , 113, 193101	2.5	6
359	Improvement of the oxidation interface in an AlGaAs/AlxOy waveguide structure by using a GaAs/AlAs superlattice. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2013 , 210, 1171-1177 ^{1.6}		
358	Excitonic properties of wurtzite InP nanowires grown on silicon substrate. <i>Nanotechnology</i> , 2013 , 24, 035704	3.4	22
357	Arsenic Pathways in Self-Catalyzed Growth of GaAs Nanowires. <i>Crystal Growth and Design</i> , 2013 , 13, 91-96 ⁵	3.5	119
356	InP/Asx quantum dots in InP nanowires: A route for single photon emitters. <i>Journal of Crystal Growth</i> , 2013 , 378, 519-523	1.6	17
355	Predictive modeling of self-catalyzed III-V nanowire growth. <i>Physical Review B</i> , 2013 , 88,	3.3	142
354	Characteristics of the surface microstructures in thick InGaN layers on GaN. <i>Optical Materials Express</i> , 2013 , 3, 1111	2.6	20
353	Atomic-plane-thick reconstruction across the interface during heteroepitaxial bonding of InP-clad quantum wells on silicon. <i>Applied Physics Letters</i> , 2013 , 102, 212101	3.4	26
352	Heteroepitaxial bonding of Si for hybrid photonic devices. <i>Materials Research Society Symposia Proceedings</i> , 2013 , 1510, 1		4
351	Band offsets at zincblende-wurtzite GaAs nanowire sidewall surfaces. <i>Applied Physics Letters</i> , 2013 , 103, 122104	3.4	27
350	Towards a monolithically integrated III-V laser on silicon: optimization of multi-quantum well growth on InP on Si. <i>Semiconductor Science and Technology</i> , 2013 , 28, 094008	1.8	11
349	Surface plasmon modulation induced by a direct-current electric field into gallium nitride thin film grown on Si(111) substrate. <i>Applied Physics Letters</i> , 2013 , 102, 021905	3.4	7
348	Evaluation of the surface bonding energy of an InP membrane bonded oxide-free to Si using instrumented nanoindentation. <i>Applied Physics Letters</i> , 2013 , 103, 081901	3.4	12
347	Effect of arsenic on the optical properties of GaSb-based type II quantum wells with quaternary GaInAsSb layers. <i>Journal of Applied Physics</i> , 2013 , 114, 223510	2.5	12
346	Design, Fabrication, and Characterization of Near-Milliwatt-Power RCLEDs Emitting at 390 nm. <i>IEEE Photonics Journal</i> , 2013 , 5, 8400709-8400709	1.8	12
345	Comparison of chemical and laser lift-off for the transfer of InGaN-based p-i-n junctions from sapphire to glass substrates 2013 ,		3
344	Fine-tuning of the interface in high-quality epitaxial silicon films deposited by plasma-enhanced chemical vapor deposition at 200 °C. <i>Journal of Materials Research</i> , 2013 , 28, 1626-1632	2.5	14
343	Gold nanocluster distribution on faceted and kinked Si nanowires. <i>Thin Solid Films</i> , 2012 , 520, 3304-3308 ^{2.2}		4

342	Effect of postgrowth heat treatment on the structural and optical properties of InP/InAsP/InP nanowires. <i>Semiconductors</i> , 2012 , 46, 175-178	0.7	10
341	Faceting mechanisms of Si nanowires and gold spreading. <i>Journal of Materials Science</i> , 2012 , 47, 1609-1613	1.3	9
340	Hair fiber as a nanoreactor in controlled synthesis of fluorescent gold nanoparticles. <i>Nano Letters</i> , 2012 , 12, 6212-7	11.5	35
339	Atomic-plane-thick reconstruction across the interface during heteroepitaxial bonding of InP-clad quantum wells to Si 2012 ,		4
338	Conductance statistics from a large array of sub-10 nm molecular junctions. <i>ACS Nano</i> , 2012 , 6, 4639-47	16.7	35
337	Colloidal CdSe/CdS dot-in-plate nanocrystals with 2D-polarized emission. <i>ACS Nano</i> , 2012 , 6, 6741-50	16.7	93
336	Growth of vertical and defect free InP nanowires on SrTiO ₃ (001) substrate and comparison with growth on silicon. <i>Journal of Crystal Growth</i> , 2012 , 343, 101-104	1.6	7
335	InAs/InP nanowires grown by catalyst assisted molecular beam epitaxy on silicon substrates. <i>Journal of Crystal Growth</i> , 2012 , 344, 45-50	1.6	17
334	Multi-scale structuration of glasses: Observations of phase separation and nanoscale heterogeneities in glasses by Z-contrast scanning electron transmission microscopy. <i>Journal of Non-Crystalline Solids</i> , 2012 , 358, 1257-1262	3.9	42
333	Effect of diffusion from a lateral surface on the rate of GaN nanowire growth. <i>Semiconductors</i> , 2012 , 46, 838-841	0.7	11
332	Core/shell colloidal semiconductor nanoplatelets. <i>Journal of the American Chemical Society</i> , 2012 , 134, 18591-8	16.4	285
331	High density InAlAs/GaAlAs quantum dots for non-linear optics in microcavities. <i>Journal of Applied Physics</i> , 2012 , 111, 043107	2.5	4
330	Growth temperature dependence of exciton lifetime in wurtzite InP nanowires grown on silicon substrates. <i>Applied Physics Letters</i> , 2012 , 100, 011906	3.4	22
329	Protein transport through a narrow solid-state nanopore at high voltage: experiments and theory. <i>ACS Nano</i> , 2012 , 6, 6236-43	16.7	100
328	FIB carving of nanopores into suspended graphene films. <i>Microelectronic Engineering</i> , 2012 , 97, 311-316	2.5	31
327	Boron distribution in the core of Si nanowire grown by chemical vapor deposition. <i>Journal of Applied Physics</i> , 2012 , 111, 094909	2.5	43
326	Nanometer-scale, quantitative composition mappings of InGaN layers from a combination of scanning transmission electron microscopy and energy dispersive x-ray spectroscopy. <i>Nanotechnology</i> , 2012 , 23, 455707	3.4	27
325	Investigation of a relaxation mechanism specific to InGaN for improved MOVPE growth of nitride solar cell materials. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2012 , 209, 25-28	1.6	21

324	Comparative optical studies of InGaAs/GaAs quantum wells grown by MBE on (100) and (311)A GaAs planes. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2012 , 9, 1621-1623		6
323	Stored elastic energy influence on the elastic-plastic transition of GaAs structures. <i>Journal of Materials Research</i> , 2012 , 27, 177-181	2.5	1
322	Mechanism of Ohmic Cr/Ni/Au contact formation on p-GaN. <i>Journal of Vacuum Science and Technology B: Nanotechnology and Microelectronics</i> , 2012 , 30, 022205	1.3	2
321	Composition and local strain mapping in Au-catalyzed axial Si/Ge nanowires. <i>Nanotechnology</i> , 2012 , 23, 395701	3.4	4
320	Effect of Cl ₂ - and HBr-based inductively coupled plasma etching on InP surface composition analyzed using in situ x-ray photoelectron spectroscopy. <i>Journal of Vacuum Science and Technology A: Vacuum, Surfaces and Films</i> , 2012 , 30, 031301	2.9	12
319	Distributed Bragg reflectors based on diluted boron-based BAlN alloys for deep ultraviolet optoelectronic applications. <i>Applied Physics Letters</i> , 2012 , 100, 051101	3.4	39
318	Kinetics and Statistics of Vapor-Liquid-Solid Growth of III-V Nanowires. <i>Materials Research Society Symposia Proceedings</i> , 2012 , 1408, 81		
317	Epitaxial growth of silicon and germanium on (100)-oriented crystalline substrates by RF PECVD at 175 °C. <i>EPJ Photovoltaics</i> , 2012 , 3, 30303	0.7	11
316	Wurtzite InP/InAs/InP core-shell nanowires emitting at telecommunication wavelengths on Si substrate. <i>Nanotechnology</i> , 2011 , 22, 405702	3.4	23
315	Morphology of self-catalyzed GaN nanowires and chronology of their formation by molecular beam epitaxy. <i>Nanotechnology</i> , 2011 , 22, 245606	3.4	55
314	Confined and Guided Vapor-Liquid-Solid Catalytic Growth of Silicon Nanoribbons: From Nanowires to Structured Silicon-on-Insulator Layers. <i>Engineering Materials</i> , 2011 , 67-89	0.4	
313	Structural analysis of site-controlled InAs/InP quantum dots. <i>Journal of Crystal Growth</i> , 2011 , 334, 37-39	1.6	3
312	New generation of Distributed Bragg Reflectors based on BAlN/AlN structures for deep UV-optoelectronic applications 2011 ,		1
311	Synthesis of long group IV semiconductor nanowires by molecular beam epitaxy. <i>Nanoscale Research Letters</i> , 2011 , 6, 113	5	16
310	Large array of sub-10-nm single-grain Au nanodots for use in nanotechnology. <i>Small</i> , 2011 , 7, 2607-13	11	23
309	Mesosopic scale description of nucleation processes in glasses. <i>Applied Physics Letters</i> , 2011 , 99, 021904	3.4	30
308	Dynamics of colloids in single solid-state nanopores. <i>Journal of Physical Chemistry B</i> , 2011 , 115, 2890-8	3.4	80
307	Direct epitaxial growth of InP based heterostructures on SrTiO ₃ /Si(001) crystalline templates. <i>Microelectronic Engineering</i> , 2011 , 88, 469-471	2.5	1

306	Origin of light scattering in ytterbium doped calcium fluoride transparent ceramic for high power lasers. <i>Journal of the European Ceramic Society</i> , 2011 , 31, 1619-1630	6	83
305	Deep structural analysis of novel BGaN material layers grown by MOVPE. <i>Journal of Crystal Growth</i> , 2011 , 315, 288-291	1.6	26
304	Structural and optical properties of nanodots, nanowires, and multi-quantum wells of III-nitride grown by MOVPE nano-selective area growth. <i>Journal of Crystal Growth</i> , 2011 , 315, 160-163	1.6	28
303	GaP/GaAs _{1-x} P _x nanowires fabricated with modulated fluxes: A step towards the realization of superlattices in a single nanowire. <i>Journal of Crystal Growth</i> , 2011 , 323, 293-296	1.6	21
302	Tuning the structural properties of InAs nanocrystals grown by molecular beam epitaxy on silicon dioxide. <i>Journal of Crystal Growth</i> , 2011 , 321, 1-7	1.6	1
301	Gold anchoring on Si sawtooth faceted nanowires. <i>Europhysics Letters</i> , 2011 , 95, 18004	1.6	9
300	Efficient photogeneration of charge carriers in silicon nanowires with a radial doping gradient. <i>Nanotechnology</i> , 2011 , 22, 315710	3.4	11
299	Quasi one-dimensional transport in single GaAs/AlGaAs core-shell nanowires. <i>Applied Physics Letters</i> , 2011 , 98, 142114	3.4	22
298	InGaAs quantum dots grown by molecular beam epitaxy for light emission on Si substrates. <i>Journal of Nanoscience and Nanotechnology</i> , 2011 , 11, 9153-9	1.3	4
297	High-aspect-ratio inductively coupled plasma etching of InP using SiH ₄ /Cl ₂ : Avoiding the effect of electrode coverplate material. <i>Journal of Vacuum Science and Technology B: Nanotechnology and Microelectronics</i> , 2011 , 29, 020601	1.3	5
296	Growth-in-place deployment of in-plane silicon nanowires. <i>Applied Physics Letters</i> , 2011 , 99, 203104	3.4	33
295	Last advances in Yb ³⁺ -doped CaF ₂ ceramics synthesis 2011 ,		2
294	Addition of Si-Containing Gases for Anisotropic Etching of III-V Materials in Chlorine-Based Inductively Coupled Plasma. <i>Japanese Journal of Applied Physics</i> , 2011 , 50, 08JE02	1.4	3
293	Addition of Si-Containing Gases for Anisotropic Etching of III-V Materials in Chlorine-Based Inductively Coupled Plasma. <i>Japanese Journal of Applied Physics</i> , 2011 , 50, 08JE02	1.4	2
292	Growth of III-Arsenide/Phosphide Nanowires by Molecular Beam Epitaxy 2011 , 68-88		
291	Effects of substrates and catalysts compositions on the crystalline quality of InP Nanowires grown on SrTiO ₃ (001), Si (001) and InP (111). <i>Materials Research Society Symposia Proceedings</i> , 2010 , 1258, 1		
290	Tailoring nanopores for efficient sensing of different biomolecules. <i>Materials Research Society Symposia Proceedings</i> , 2010 , 1253, 33		1
289	Optically Active Defects in an InAsP/InP Quantum Well Monolithically Integrated on SrTiO ₃ (001). <i>Materials Research Society Symposia Proceedings</i> , 2010 , 1252, 1		0

288	Nano-Patterning of Graphene Structures Using Highly Focused Beams of Gallium Ions. <i>Materials Research Society Symposia Proceedings</i> , 2010 , 1259, 1		2
287	Quantum well infrared photodetectors hardness to the nonideality of the energy band profile. <i>Journal of Applied Physics</i> , 2010 , 107, 123110	2.5	3
286	Nucleation antibunching in catalyst-assisted nanowire growth. <i>Physical Review Letters</i> , 2010 , 104, 135507	4.4	95
285	Growth kinetics of a single InP _{1-x} As _x nanowire. <i>Physical Review B</i> , 2010 , 81,	3.3	78
284	Effects of using As ₂ and As ₄ on the optical properties of InGaAs quantum rods grown by molecular beam epitaxy. <i>Journal of Applied Physics</i> , 2010 , 108, 103522	2.5	6
283	Type II heterostructures formed by zinc-blende inclusions in InP and GaAs wurtzite nanowires. <i>Applied Physics Letters</i> , 2010 , 97, 041910	3.4	45
282	Interface roughness transport in terahertz quantum cascade detectors. <i>Applied Physics Letters</i> , 2010 , 96, 061111	3.4	12
281	Crystal phase quantum dots. <i>Nano Letters</i> , 2010 , 10, 1198-201	11.5	207
280	Growth, structure and phase transitions of epitaxial nanowires of III-V semiconductors. <i>Journal of Physics: Conference Series</i> , 2010 , 209, 012002	0.3	11
279	Time-resolved spectroscopy of InAsP/InP(001) quantum dots emitting near 2 μ m. <i>Applied Physics Letters</i> , 2010 , 97, 131907	3.4	13
278	Nanowires for quantum optics 2010 ,		1
277	Quantum optics with single nanowire quantum dots 2010 ,		1
276	Polarization Properties of Columnar Quantum Dots: Effects of Aspect Ratio and Compositional Contrast. <i>IEEE Journal of Quantum Electronics</i> , 2010 , 46, 197-204	2	18
275	Direct FIB fabrication and integration of single nanopore devices for the manipulation of macromolecules. <i>Microelectronic Engineering</i> , 2010 , 87, 1300-1303	2.5	32
274	Confined VLS growth and structural characterization of silicon nanoribbons. <i>Microelectronic Engineering</i> , 2010 , 87, 1522-1526	2.5	7
273	Elastic anisotropy of polycrystalline Au films: Modeling and respective contributions of X-ray diffraction, nanoindentation and Brillouin light scattering. <i>Acta Materialia</i> , 2010 , 58, 4998-5008	8.4	35
272	Structure of annealed nanoindentations in n- and p-doped (001)GaAs. <i>Journal of Applied Physics</i> , 2009 , 106, 123516	2.5	2
271	Twin formation during the growth of InP on SrTiO ₃ . <i>Applied Physics Letters</i> , 2009 , 94, 231902	3.4	9

270	Control of polarization and dipole moment in low-dimensional semiconductor nanostructures. <i>Applied Physics Letters</i> , 2009 , 95, 221116	3-4	13
269	Optically active defects in an InAsP/InP quantum well monolithically grown on SrTiO ₃ (001). <i>Applied Physics Letters</i> , 2009 , 95, 232116	3-4	14
268	Accommodation at the interface of highly dissimilar semiconductor/oxide epitaxial systems. <i>Physical Review B</i> , 2009 , 80,	3-3	41
267	Orientation dependent emission properties of columnar quantum dash laser structures. <i>Applied Physics Letters</i> , 2009 , 94, 241113	3-4	12
266	Surface-emitting quantum cascade lasers with metallic photonic-crystal resonators. <i>Applied Physics Letters</i> , 2009 , 94, 221101	3-4	21
265	Time-multiplexed, inductively coupled plasma process with separate SiCl ₄ and O ₂ steps for etching of GaAs with high selectivity. <i>Journal of Vacuum Science & Technology B</i> , 2009 , 27, 2270		9
264	Epitaxial growth and picosecond carrier dynamics of GaInAs/GaInNAs superlattices. <i>Applied Physics Letters</i> , 2009 , 95, 141910	3-4	6
263	Inductively coupled plasma etching of GaAs suspended photonic crystal cavities. <i>Journal of Vacuum Science & Technology B</i> , 2009 , 27, 1909		13
262	Crystal orientation of GaAs islands grown on SrTiO ₃ (001) by molecular beam epitaxy. <i>Applied Physics Letters</i> , 2009 , 95, 011907	3-4	9
261	Surface-plasmon distributed-feedback quantum cascade lasers operating pulsed, room temperature. <i>Applied Physics Letters</i> , 2009 , 95, 091105	3-4	8
260	Electronic structure properties of the In(Ga)As/GaAs quantum dot-quantum well tunnel-injection system. <i>Semiconductor Science and Technology</i> , 2009 , 24, 085011	1.8	2
259	Si Incorporation in InP Nanowires Grown by Au-Assisted Molecular Beam Epitaxy. <i>Journal of Nanomaterials</i> , 2009 , 2009, 1-7	3-2	11
258	One Step Nano-Selective Area Growth of Localized InAs/InP Quantum Dots For Single Photon Source Applications. <i>Materials Research Society Symposia Proceedings</i> , 2009 , 1228, 120701		
257	Direct FIB fabrication and integration of single nanopore devices for the manipulation of macromolecules. <i>Materials Research Society Symposia Proceedings</i> , 2009 , 1191, 78		2
256	Exploration of the ultimate patterning potential achievable with focused ion beams. <i>Ultramicroscopy</i> , 2009 , 109, 457-62	3-1	16
255	Doping influence on the nanoindentation response of GaAs. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2009 , 6, 1841-1846		1
254	Synthesis and optical characterizations of Yb-doped CaF ₂ ceramics. <i>Optical Materials</i> , 2009 , 31, 750-753	3-3	100
253	High yield syntheses of reactive fluoride K _{1-x} (Y,Ln) _x F _{1+2x} nanoparticles. <i>Optical Materials</i> , 2009 , 31, 1177-1183	3-3	12

252	Growth and structural characterization of GaAs/GaAsSb axial heterostructured nanowires. <i>Journal of Crystal Growth</i> , 2009 , 311, 1847-1850	1.6	19
251	Influence of the surface reconstruction on the growth of InP on SrTiO ₃ (0 0 1). <i>Journal of Crystal Growth</i> , 2009 , 311, 1042-1045	1.6	16
250	Optimization of 1550nm InAs/InP Quantum Dash and Quantum Dot based semiconductor optical amplifier 2009 ,		1
249	A semiconductor laser device for the generation of surface-plasmons upon electrical injection. <i>Optics Express</i> , 2009 , 17, 9391-400	3.3	22
248	Silicon nanowires coated with silver nanostructures as ultrasensitive interfaces for surface-enhanced Raman spectroscopy. <i>ACS Applied Materials & Interfaces</i> , 2009 , 1, 1396-403	9.5	125
247	Role of nonlinear effects in nanowire growth and crystal phase. <i>Physical Review B</i> , 2009 , 80,	3.3	83
246	Potential of semiconductor nanowires for single photon sources 2009 ,		4
245	Challenges and Opportunities for Focused Ion Beam Processing at the Nano-scale. <i>Microscopy and Microanalysis</i> , 2009 , 15, 320-321	0.5	
244	Nanoindentation-induced structural phase transformations in crystalline and amorphous germanium. <i>International Journal of Nano and Biomaterials</i> , 2009 , 2, 91	0.2	
243	Localisation of silicon nanowires grown by UHV-CVD in (111)-oriented apertures opened in Si (001). <i>IOP Conference Series: Materials Science and Engineering</i> , 2009 , 6, 012015	0.4	2
242	Controlling the aspect ratio of quantum dots: From columnar dots to quantum rods. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2008 , 14, 1204-1213	3.8	15
241	Anisotropic and Smooth Inductively Coupled Plasma Etching of III-V Laser Waveguides Using HBr-O ₂ Chemistry. <i>Journal of the Electrochemical Society</i> , 2008 , 155, H778	3.9	21
240	Preparation and up-conversion luminescence of 8 nm rare-earth doped fluoride nanoparticles. <i>Optics Express</i> , 2008 , 16, 14544-9	3.3	37
239	Wurtzite to zinc blende phase transition in GaAs nanowires induced by epitaxial burying. <i>Nano Letters</i> , 2008 , 8, 1638-43	11.5	60
238	Zinc blende GaAsSb nanowires grown by molecular beam epitaxy. <i>Nanotechnology</i> , 2008 , 19, 275605	3.4	46
237	Surface-plasmon distributed-feedback mid-infrared quantum cascade lasers based on hybrid plasmon/air-guided modes 2008 ,		1
236	Spontaneous compliance of the InP/SrTiO ₃ heterointerface. <i>Applied Physics Letters</i> , 2008 , 92, 241907	3.4	35
235	Surface-plasmon distributed-feedback mid-infrared quantum cascade lasers based on hybrid plasmon/air-guided modes. <i>Electronics Letters</i> , 2008 , 44, 807	1.1	11

234	Growth and characterization of wurtzite GaAs nanowires with defect-free zinc blende GaAsSb inserts. <i>Nano Letters</i> , 2008 , 8, 4459-63	11.5	103
233	Exploration of the Ultimate Patterning Potential Achievable with Focused Ion Beams. <i>Materials Research Society Symposia Proceedings</i> , 2008 , 1089, 30101		1
232	Nanoindentation response of a thin InP membrane. <i>Journal Physics D: Applied Physics</i> , 2008 , 41, 074003	3	2
231	Sidewall passivation assisted by a silicon coverplate during Cl ₂ /H ₂ and HBr inductively coupled plasma etching of InP for photonic devices. <i>Journal of Vacuum Science & Technology B</i> , 2008 , 26, 666		34
230	Smooth sidewall in InP-based photonic crystal membrane etched by N ₂ -based inductively coupled plasma. <i>Journal of Vacuum Science & Technology B</i> , 2008 , 26, 1326		18
229	Columnar quantum dashes for an active region in polarization independent semiconductor optical amplifiers at 1.55 μ m. <i>Applied Physics Letters</i> , 2008 , 93, 171910	3.4	19
228	Competition between InP and In ₂ O ₃ islands during the growth of InP on SrTiO ₃ . <i>Journal of Applied Physics</i> , 2008 , 104, 033509	2.5	3
227	Photoluminescence from a single InGaAs epitaxial quantum rod. <i>Applied Physics Letters</i> , 2008 , 92, 021901	3.4	18
226	Growth-interruption-induced low-density InAs quantum dots on GaAs. <i>Journal of Applied Physics</i> , 2008 , 104, 083508	2.5	20
225	Metamorphic approach to single quantum dot emission at 1.55 μ m on GaAs substrate. <i>Journal of Applied Physics</i> , 2008 , 103, 103533	2.5	30
224	Self-assembled Ge nanocrystals on BaTiO ₃ /SrTiO ₃ /Si(001). <i>Applied Physics Letters</i> , 2008 , 92, 031904	3.4	17
223	Metal organic vapor phase epitaxy of InAsP/InP(001) quantum dots for 1.55 μ m applications: Growth, structural, and optical properties. <i>Journal of Applied Physics</i> , 2008 , 104, 043504	2.5	25
222	Shape-engineered epitaxial InGaAs quantum rods for laser applications. <i>Applied Physics Letters</i> , 2008 , 92, 121102	3.4	19
221	Scanning tunneling spectroscopy of cleaved InAs/GaAs quantum dots at low temperatures. <i>Physical Review B</i> , 2008 , 77,	3.3	33
220	Epitaxial growth of quantum rods with high aspect ratio and compositional contrast. <i>Journal of Applied Physics</i> , 2008 , 104, 113522	2.5	12
219	Directional growth of Ge on GaAs at 175 $^{\circ}$ C using plasma-generated nanocrystals. <i>Applied Physics Letters</i> , 2008 , 92, 103108	3.4	12
218	Semiconductor nanowires in InP and related material systems: MBE growth and properties 2008 ,		1
217	Recent developments of InP-based quantum dashes for directly modulated lasers and semiconductor optical amplifiers 2008 ,		1

216	Polarization dependence of electroluminescence from closely-stacked and columnar quantum dots. <i>Optical and Quantum Electronics</i> , 2008 , 40, 239-248	2.4	22
215	Influence of recapture on the emission statistics of short radiative lifetime quantum dots. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2008 , 5, 2520-2523		1
214	GaN/AlN free-standing nanowires grown by molecular beam epitaxy. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2008 , 5, 1556-1558		15
213	De-relaxation of plastically relaxed InAs/GaAs quantum dots during the growth of a GaAs encapsulation layer. <i>Journal of Crystal Growth</i> , 2008 , 310, 536-540	1.6	2
212	One-step nano-selective area growth (nano-SAG) of localized InAs/InP quantum dots: First step towards single-photon source applications. <i>Journal of Crystal Growth</i> , 2008 , 310, 3413-3415	1.6	7
211	A new way to integrate solid state nanopores for translocation experiments. <i>Microelectronic Engineering</i> , 2008 , 85, 1311-1313	2.5	1
210	Optics with single nanowires. <i>Comptes Rendus Physique</i> , 2008 , 9, 804-815	1.4	20
209	Structure of nanoindentations in heavily n- and p-doped (0 0 1) GaAs. <i>Acta Materialia</i> , 2008 , 56, 1417-1426	2.4	12
208	Epitaxial growth of high- κ oxides on silicon. <i>Thin Solid Films</i> , 2008 , 517, 197-200	2.2	7
207	In situ generation of indium catalysts to grow crystalline silicon nanowires at low temperature on ITO. <i>Journal of Materials Chemistry</i> , 2008 , 18, 5187		75
206	Heterostructure formation in nanowhiskers via diffusion mechanism. <i>Technical Physics Letters</i> , 2008 , 34, 750-753	0.7	2
205	Nano-FIB from Research to Applications [a European Scalpel for Nanosciences. <i>Springer Proceedings in Physics</i> , 2008 , 431-440	0.2	
204	Towards polarization insensitive semiconductor optical amplifiers using InAs/GaAs columnar quantum dots 2008 ,		1
203	Growth and characterization of InAs columnar quantum dots on GaAs substrate. <i>Journal of Applied Physics</i> , 2007 , 102, 033502	2.5	27
202	Growth and characterization of InP nanowires with InAsP insertions. <i>Nano Letters</i> , 2007 , 7, 1500-4	11.5	102
201	Study of radial growth rate and size control of silicon nanocrystals in square-wave-modulated silane plasmas. <i>Applied Physics Letters</i> , 2007 , 91, 111501	3.4	15
200	Organometallic precursors as catalyst to grow three-dimensional micro/nanostructures: Spheres, clusters & wires. <i>Surface and Coatings Technology</i> , 2007 , 201, 9104-9108	4.4	5
199	Large intrinsic birefringence in zinc-blende based artificial semiconductors. <i>Comptes Rendus Physique</i> , 2007 , 8, 1174-1183	1.4	1

198	Sub-5nm FIB direct patterning of nanodevices. <i>Microelectronic Engineering</i> , 2007 , 84, 779-783	2.5	96
197	Development of robust interfaces based on crystalline $\text{Al}_2\text{O}_3(001)$ for subsequent deposition of amorphous high- κ oxides. <i>Microelectronic Engineering</i> , 2007 , 84, 2243-2246	2.5	18
196	TEM-nanoindentation studies of semiconducting structures. <i>Micron</i> , 2007 , 38, 377-89	2.3	12
195	Rare-earth doped oxyfluoride glass-ceramics and fluoride ceramics: Synthesis and optical properties. <i>Optical Materials</i> , 2007 , 29, 1263-1270	3.3	76
194	Growth of InAs bilayer quantum dots for long-wavelength laser emission on GaAs. <i>Journal of Crystal Growth</i> , 2007 , 301-302, 959-962	1.6	16
193	GaAs nanowires formed by Au-assisted molecular beam epitaxy: Effect of growth temperature. <i>Journal of Crystal Growth</i> , 2007 , 301-302, 853-856	1.6	61
192	Nanoindentation response of compound semiconductors. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2007 , 4, 3002-3009		2
191	Modulated reflectivity probing of quantum dot and wetting layer states in InAs/GaInAsP/InP quantum dot laser structures. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2007 , 204, 496-499	1.6	4
190	Synthesis and photoluminescence properties of silicon nanowires treated by high-pressure water vapor annealing. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2007 , 204, 1302-1306	1.6	26
189	Telecom-wavelength single-photon sources for quantum communications. <i>Journal of Physics Condensed Matter</i> , 2007 , 19, 225005	1.8	9
188	Local electronic transport through InAs/InP(0 0 1) quantum dots capped with a thin InP layer studied by an AFM conductive probe. <i>Semiconductor Science and Technology</i> , 2007 , 22, 755-762	1.8	2
187	Optical and electronic properties of GaAs-based structures with columnar quantum dots. <i>Applied Physics Letters</i> , 2007 , 90, 181933	3.4	12
186	Density of InAs/InP(001) quantum dots grown by metal-organic vapor phase epitaxy: Independent effects of InAs and cap-layer growth rates. <i>Applied Physics Letters</i> , 2007 , 91, 102107	3.4	10
185	Structural and optical properties of low-density and In-rich InAs/GaAs quantum dots. <i>Journal of Applied Physics</i> , 2007 , 101, 024918	2.5	33
184	Submicron-diameter semiconductor pillar microcavities with very high quality factors. <i>Applied Physics Letters</i> , 2007 , 90, 091120	3.4	25
183	Growth of crystalline Al_2O_3 on Si by molecular beam epitaxy: Influence of the substrate orientation. <i>Journal of Applied Physics</i> , 2007 , 102, 024101	2.5	21
182	Modulation spectroscopy characterization of InAs/GaInAsP/InP quantum dash laser structures 2007 , 6481, 52		2
181	Mechanical response of a single and released InP membrane. <i>Materials Research Society Symposia Proceedings</i> , 2007 , 1049, 1		

180	Thermodynamic analysis of the shape, anisotropy and formation process of InAs/InP(001) quantum dots and quantum sticks grown by metalorganic vapor phase epitaxy. <i>Surface Science</i> , 2007 , 601, 2765-2768	1.8	3
179	Synthesis of silicon nanocrystals in silane plasmas for nanoelectronics and large area electronic devices. <i>Journal Physics D: Applied Physics</i> , 2007 , 40, 2258-2266	3	65
178	Au-assisted molecular beam epitaxy of InAs nanowires: Growth and theoretical analysis. <i>Journal of Applied Physics</i> , 2007 , 102, 094313	2.5	123
177	Growth of GaN free-standing nanowires by plasma-assisted molecular beam epitaxy: structural and optical characterization. <i>Nanotechnology</i> , 2007 , 18, 385306	3.4	103
176	InAs nanocrystals on SiO ₂ /Si by molecular beam epitaxy for memory applications. <i>Applied Physics Letters</i> , 2007 , 91, 133114	3.4	15
175	Wetting layer states of InAs/GaAs self-assembled quantum dot structures: Effect of intermixing and capping layer. <i>Journal of Applied Physics</i> , 2007 , 101, 063539	2.5	29
174	Fast radiative quantum dots: From single to multiple photon emission. <i>Applied Physics Letters</i> , 2007 , 90, 223118	3.4	22
173	Why does wurtzite form in nanowires of III-V zinc blende semiconductors?. <i>Physical Review Letters</i> , 2007 , 99, 146101	7.4	615
172	InAs/InP Quantum Dash Based Electro Optic Modulator with Over 70 NM Bandwidth at 1.55 μ m. 2007 ,		1
171	Polarization dependence study of electroluminescence and absorption from InAs/GaAs columnar quantum dots. <i>Applied Physics Letters</i> , 2007 , 91, 191123	3.4	35
170	Monolithic integration of InP based heterostructures on silicon using crystalline Gd ₂ O ₃ buffers. <i>Applied Physics Letters</i> , 2007 , 91, 241912	3.4	52
169	Synthesis and optical characterizations of undoped and rare-earth-doped CaF ₂ nanoparticles. <i>Journal of Solid State Chemistry</i> , 2006 , 179, 2636-2644	3.3	104
168	Focused ion beam sculpted membranes for nanoscience tooling. <i>Microelectronic Engineering</i> , 2006 , 83, 1474-1477	2.5	50
167	Neutral and charged multi-exciton complexes in single InAs quantum dots grown on InP(001). <i>Nanotechnology</i> , 2006 , 17, 1831-1834	3.4	7
166	Subpicosecond pulse generation at 134 GHz and low radiofrequency spectral linewidth in quantum dash-based Fabry-Perot lasers emitting at 1.5 μ m. <i>Electronics Letters</i> , 2006 , 42, 91	1.1	18
165	1.43 μ m InAs bilayer quantum dot lasers on GaAs substrate. <i>Electronics Letters</i> , 2006 , 42, 638	1.1	17
164	Metal-insulator Transition and Magnetic Domains in (Ga,Mn)As Epilayers. <i>Materials Research Society Symposia Proceedings</i> , 2006 , 941, 1		1
163	Synthesis and Optical Properties of Silicon Oxide Nanowires. <i>Materials Research Society Symposia Proceedings</i> , 2006 , 958, 1		

162	Subpicosecond pulse generation at 134GHz using a quantum-dash-based Fabry-Perot laser emitting at 1.56 μ m. <i>Applied Physics Letters</i> , 2006 , 88, 241105	3-4	68
161	Initial stage of the overgrowth of InP on InAsInP(001) quantum dots: Formation of InP terraces driven by preferential nucleation on quantum dot edges. <i>Applied Physics Letters</i> , 2006 , 89, 031923	3-4	11
160	Imaging the electric properties of InAsInP(001) quantum dots capped with a thin InP layer by conductive atomic force microscopy: Evidence of memory effect. <i>Applied Physics Letters</i> , 2006 , 89, 112115	3-4	16
159	Structural properties of epitaxial SrTiO ₃ thin films grown by molecular beam epitaxy on Si(001). <i>Journal of Applied Physics</i> , 2006 , 100, 124109	2-5	66
158	Vapor-liquid-solid mechanisms: Challenges for nanosized quantum cluster/dot/wire materials. <i>Journal of Applied Physics</i> , 2006 , 100, 044315	2-5	44
157	Pseudomorphic molecular beam epitaxy growth of Al ₂ O ₃ (001) on Si(001) and evidence for spontaneous lattice reorientation during epitaxy. <i>Applied Physics Letters</i> , 2006 , 89, 232907	3-4	32
156	Microphotoluminescence of exciton and biexciton around 1.5 μ m from a single InAsInP(001) quantum dot. <i>Applied Physics Letters</i> , 2006 , 88, 133101	3-4	16
155	Indium incorporation in In-rich In _x Ga _{1-x} AsGaAs layers grown by low-pressure metalorganic vapor-phase epitaxy and its influence on the growth of self-assembled quantum dots. <i>Physical Review B</i> , 2006 , 73,	3-3	1
154	Effect of layer stacking and p-type doping on the performance of InAsInP quantum-dash-in-a-well lasers emitting at 1.55 μ m. <i>Applied Physics Letters</i> , 2006 , 89, 241123	3-4	25
153	Thermodynamic description of the competition between quantum dots and quantum dashes during metalorganic vapor phase epitaxy in the InAsInP(001) system: Experiment and theory. <i>Physical Review B</i> , 2006 , 74,	3-3	13
152	Elastic behavior of polycrystalline thin films inferred from in situ micromechanical testing and modeling. <i>Applied Physics Letters</i> , 2006 , 89, 061911	3-4	16
151	Temperature conditions for GaAs nanowire formation by Au-assisted molecular beam epitaxy. <i>Nanotechnology</i> , 2006 , 17, 4025-30	3-4	101
150	Low density of self-assembled InAs quantum dots grown by solid-source molecular beam epitaxy on InP(001). <i>Applied Physics Letters</i> , 2006 , 89, 123112	3-4	15
149	Thermodynamical analysis of the shape and size dispersion of InAsInP(001) quantum dots. <i>Physical Review B</i> , 2006 , 73,	3-3	12
148	Magnetic properties and domain structure of (Ga,Mn)As films with perpendicular anisotropy. <i>Physical Review B</i> , 2006 , 73,	3-3	57
147	Influence of deposition parameters and post-deposition plasma treatments on the photoluminescence of polymorphous silicon carbon alloys. <i>Journal of Non-Crystalline Solids</i> , 2006 , 352, 1357-1360	3-9	9
146	Effect of cap-layer growth rate on morphology and luminescence of InAsInP(001) quantum dots grown by metal-organic vapor phase epitaxy. <i>Journal of Applied Physics</i> , 2006 , 100, 033508	2-5	12
145	Synthesis of Fluoride Nanoparticles in Non-Aqueous Nanoreactors. Luminescence Study of Eu ³⁺ :CaF ₂ . <i>Zeitschrift Fur Anorganische Und Allgemeine Chemie</i> , 2006 , 632, 1538-1543	1-3	20

144	InAs/InP(001) quantum dots and quantum sticks grown by MOVPE: shape, anisotropy and formation process. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2006 , 3, 3928-3931		
143	InAs(Sb) quantum dots grown on GaAs by MBE. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2006 , 3, 3997-4000		5
142	Cavity QED with a single QD inside an optical microcavity. <i>Physica Status Solidi (B): Basic Research</i> , 2006 , 243, 3879-3884	1.3	5
141	Towards a mid-infrared polaron laser using InAs/GaAs self-assembled quantum dots. <i>Physica Status Solidi (B): Basic Research</i> , 2006 , 243, 3895-3899	1.3	
140	Influence of Ce ³⁺ doping on the structure and luminescence of Er ³⁺ -doped transparent glass-ceramics. <i>Optical Materials</i> , 2006 , 28, 638-642	3.3	26
139	Er ³⁺ -doped PbF ₂ : Comparison between nanocrystals in glass-ceramics and bulk single crystals. <i>Journal of Solid State Chemistry</i> , 2006 , 179, 1995-2003	3.3	96
138	Structural and photoluminescence studies of InAsN quantum dots grown on GaAs by MBE. <i>Journal of Crystal Growth</i> , 2006 , 290, 80-86	1.6	14
137	Oxide glass used as inorganic template for fluorescent fluoride nanoparticles synthesis. <i>Optical Materials</i> , 2006 , 28, 1401-1404	3.3	28
136	Elastic properties of polycrystalline gold thin films: Simulation and X-ray diffraction experiments. <i>Surface and Coatings Technology</i> , 2006 , 201, 4300-4304	4.4	7
135	Indentation behaviour of (011) thin films of III-V semiconductors: polarity effect differences between GaAs and InP. <i>International Journal of Materials Research</i> , 2006 , 97, 1230-1234	0.5	
134	Analysis of vapor-liquid-solid mechanism in Au-assisted GaAs nanowire growth. <i>Applied Physics Letters</i> , 2005 , 87, 203101	3.4	231
133	Effect of CeF ₃ Addition on the Nucleation and Up-Conversion Luminescence in Transparent Oxyfluoride Glass-Ceramics. <i>Chemistry of Materials</i> , 2005 , 17, 2216-2222	9.6	71
132	GaNAsSb Alloy and Its Potential for Device Applications 2005 , 471-493		5
131	Buried dislocation networks for the controlled growth of III-V semiconductor nanostructures. <i>Journal of Crystal Growth</i> , 2005 , 275, e1647-e1653	1.6	1
130	Stress-driven self-ordering of III-V nanostructures. <i>Journal of Crystal Growth</i> , 2005 , 275, e2245-e2249	1.6	3
129	GSMBE growth of GaInAsP/InP 1.3- μ m-TM-lasers for monolithic integration with optical waveguide isolator. <i>Journal of Crystal Growth</i> , 2005 , 278, 709-713	1.6	4
128	An indentation method to measure the CRSS of semiconducting materials at elevated temperature. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2005 , 400-401, 451-455	5.3	
127	Mechanical response of wall-patterned GaAs surface. <i>Acta Materialia</i> , 2005 , 53, 1907-1912	8.4	10

126	Luminescence of polymorphous silicon carbon alloys. <i>Optical Materials</i> , 2005 , 27, 953-957	3.3	20
125	Conservative indentation flow throughout thin (011) InP foils. <i>Journal of Materials Science</i> , 2005 , 40, 3809-3811	4.3	
124	Stress-engineered orderings of self-assembled III-V semiconductor nanostructures. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2005 , 2, 1245-1250		1
123	Dislocation networks adapted to order the growth of III-V semiconductor nanostructures. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2005 , 2, 1933-1937		4
122	Polarity influence on the nanoindentation response of GaAs. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2005 , 2, 2004-2009		2
121	Indentation deformation of thin {111} GaAs and InSb foils: influence of polarity. <i>Philosophical Magazine Letters</i> , 2005 , 85, 1-12	1	3
120	Deviation of the mechanical response of wall-patterned GaAs surface: a central-plastic-zone criterion. <i>Materials Research Society Symposia Proceedings</i> , 2005 , 904, 1		
119	Growth of nanometric CuGaO ₂ structures on copper substrates. <i>Nanotechnology</i> , 2005 , 16, 2790-2793	3.4	5
118	Polarity influence on the indentation punching of thin {111} GaAs foils at elevated temperatures. <i>Journal Physics D: Applied Physics</i> , 2005 , 38, 1140-1147	3	5
117	Reactive-ion etching of high-Q and submicron-diameter GaAs/AlAs micropillar cavities. <i>Journal of Vacuum Science & Technology an Official Journal of the American Vacuum Society B, Microelectronics Processing and Phenomena</i> , 2005 , 23, 2499		14
116	Electroabsorption spectroscopy of GeBi self-assembled islands. <i>Journal of Applied Physics</i> , 2005 , 97, 083525	5.5	1
115	Optical and structural investigation of In _{1-x} Ga _x P free-standing microrods. <i>Journal of Applied Physics</i> , 2005 , 98, 053506	2.5	5
114	InAs/InP(001) quantum dots emitting at 1.55 μ m grown by low-pressure metalorganic vapor-phase epitaxy. <i>Applied Physics Letters</i> , 2005 , 87, 253114	3.4	28
113	Nanoindentation response of a single micrometer-sized GaAs wall. <i>Applied Physics Letters</i> , 2005 , 86, 163107	3.4	4
112	Mid-infrared intersublevel absorption of vertically electronically coupled InAs quantum dots. <i>Applied Physics Letters</i> , 2005 , 87, 173113	3.4	20
111	Nucleation efficiency of erbium and ytterbium fluorides in transparent oxyfluoride glass-ceramics. <i>Journal of Materials Research</i> , 2005 , 20, 472-481	2.5	47
110	Indentation crystallization and phase transformation of amorphous germanium. <i>Materials Research Society Symposia Proceedings</i> , 2005 , 904, 1		
109	TEM determination of the local concentrations of substitutional and interstitial Mn and antisite defects in ferromagnetic GaMnAs 2005 , 147-150		

108	Nanoindentation investigation of solid-solution strengthening in III-V semiconductor alloys. <i>International Journal of Materials Research</i> , 2005 , 96, 1237-1241		3
107	Transformation de phase dans un film de germanium amorphe induite par nano-indentation. <i>Materiaux Et Techniques</i> , 2005 , 93, 257-262	0.6	1
106	Effect of the p+-GaAs contact layer doping level on the gradual degradation of InGaAs/AlGaAs pump lasers. <i>EPJ Applied Physics</i> , 2004 , 27, 465-468	1.1	1
105	Long-range ordering of III-V semiconductor nanostructures by shallowly buried dislocation networks. <i>Journal of Physics Condensed Matter</i> , 2004 , 16, 7941-7946	1.8	2
104	GaInAs/GaAs quantum-well growth assisted by Sb surfactant: Toward 1.3 μ m emission. <i>Applied Physics Letters</i> , 2004 , 84, 3981-3983	3.4	70
103	Buried dislocation networks designed to organize the growth of III-V semiconductor nanostructures. <i>Physical Review B</i> , 2004 , 70,	3.3	6
102	Indentation-induced crystallization and phase transformation of amorphous germanium. <i>Journal of Applied Physics</i> , 2004 , 96, 1464-1468	2.5	33
101	Determination of the local concentrations of Mn interstitials and antisite defects in GaMnAs. <i>Physical Review Letters</i> , 2004 , 93, 086107	7.4	43
100	Absolute determination of the asymmetry of the in-plane deformation of GaAs (001). <i>Journal of Applied Physics</i> , 2004 , 95, 3984-3987	2.5	11
99	Polarity-induced changes in the nanoindentation response of GaAs. <i>Journal of Materials Research</i> , 2004 , 19, 131-136	2.5	16
98	Material and optical properties of GaAs grown on (001) Ge/Si pseudo-substrate. <i>Materials Research Society Symposia Proceedings</i> , 2004 , 809, B2.4.1		
97	Solid-solution strengthening in ordered In _x Ga _{1-x} P alloys. <i>Philosophical Magazine Letters</i> , 2004 , 84, 373-381	1	11
96	Further insight into the growth temperature influence of 1.3 μ m GaInNAs/GaAs QWs on their properties. <i>IEE Proceedings: Optoelectronics</i> , 2004 , 151, 279-283		4
95	Growth of GaN _x As _{1-x} atomic monolayers and their insertion in the vicinity of GaInAs quantum wells. <i>IEE Proceedings: Optoelectronics</i> , 2004 , 151, 254-258		4
94	Indentation punching through thin (011) InP. <i>Journal of Materials Science</i> , 2004 , 39, 943-949	4.3	16
93	Effects of GaNAsSb intermediate barriers on GaInNAsSb quantum well grown by molecular beam epitaxy. <i>Journal of Crystal Growth</i> , 2004 , 263, 58-62	1.6	4
92	TEM study of the indentation behaviour of thin Au film on GaAs. <i>Thin Solid Films</i> , 2004 , 460, 150-155	2.2	5
91	Photoluminescence probing of non-radiative channels in hydrogenated In(Ga)As/GaAs quantum dots. <i>Journal of Crystal Growth</i> , 2004 , 264, 334-338	1.6	2

90	Direct growth of GaAs-based structures on exactly (0 0 1)-oriented Ge/Si virtual substrates: reduction of the structural defect density and observation of electroluminescence at room temperature under CW electrical injection. <i>Journal of Crystal Growth</i> , 2004 , 265, 53-59	1.6	28
89	Structural studies of nano/micrometric semiconducting GaInP wires grown by MOCVD. <i>Journal of Crystal Growth</i> , 2004 , 272, 198-203	1.6	10
88	Morphology and composition of highly strained InGaAs and InGaAsN layers grown on GaAs substrate. <i>Applied Physics Letters</i> , 2004 , 84, 203-205	3.4	49
87	Vickers indentation of thin GaAs (001) samples. <i>Philosophical Magazine</i> , 2004 , 84, 3281-3298	1.6	10
86	Composition profiling of InAs/GaAs quantum dots. <i>Applied Physics Letters</i> , 2004 , 85, 3717-3719	3.4	82
85	Polarity-induced changes in the nanoindentation response of GaAs 2004 , 19, 131		2
84	1.5 [micro sign]m laser on GaAs with GaInNASb quinary quantum well. <i>Electronics Letters</i> , 2003 , 39, 519	1.1	30
83	Plasticity of misoriented (001) GaAs surface. <i>Journal of Materials Science Letters</i> , 2003 , 22, 565-567		4
82	Improvement of heteroepitaxial growth by the use of twist-bonded compliant substrate: Role of the surface plasticity. <i>Journal of Electronic Materials</i> , 2003 , 32, 861-867	1.9	2
81	Plastic deformation of III-V semiconductors under concentrated load. <i>Progress in Crystal Growth and Characterization of Materials</i> , 2003 , 47, 1-43	3.5	39
80	Structural properties of strained piezoelectric [111]A-oriented InGaAs/GaAs quantum well structures grown by MOVPE. <i>Journal of Crystal Growth</i> , 2003 , 248, 359-363	1.6	2
79	N-enrichment at the GaAs _{1-x} N _x /GaAs(001) interface: microstructure and optical properties. <i>Journal of Crystal Growth</i> , 2003 , 248, 441-445	1.6	5
78	Comparison of GaInNAS/GaAs and GaInNAS/GaNAs/GaAs quantum wells emitting over 1.3 μ m wavelength. <i>Journal of Crystal Growth</i> , 2003 , 251, 403-407	1.6	16
77	Electromodulation of the interband and intraband absorption of Ge/Si self-assembled islands. <i>Physica E: Low-Dimensional Systems and Nanostructures</i> , 2003 , 16, 450-454	3	7
76	Silicon-on-insulator and SiGe waveguide photodetectors with Ge/Si self-assembled islands. <i>Physica E: Low-Dimensional Systems and Nanostructures</i> , 2003 , 16, 523-527	3	12
75	Characterization of piezoelectric and pyroelectric properties of MOVPE-grown strained (111)A InGaAs/GaAs QW structures by modulation spectroscopy. <i>Physica Status Solidi A</i> , 2003 , 195, 260-264		13
74	Phase separation and superlattice formation by spontaneous vertical composition modulation in GaAs _{1-x} N _x /GaAs. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2003 , 2749-2752		
73	Growth and optical characterizations of InAs quantum dots on InP substrate: towards a 1.55 μ m quantum dot laser. <i>Journal of Crystal Growth</i> , 2003 , 251, 230-235	1.6	55

72	Indentation-induced deformations of GaAs(011) at a high temperature. <i>Philosophical Magazine</i> , 2003 , 83, 1653-1673	1.6	19
71	Control of nitrogen incorporation in Ga(In)NAs grown by metalorganic vapor phase epitaxy. <i>Journal of Applied Physics</i> , 2003 , 94, 2752-2754	2.5	9
70	Thermal stability of ion-irradiated InGaAs with (sub-) picosecond carrier lifetime. <i>Applied Physics Letters</i> , 2003 , 82, 856-858	3.4	23
69	Investigations on GaInNASb quinary alloy for 1.5 μ m laser emission on GaAs. <i>Applied Physics Letters</i> , 2003 , 83, 1298-1300	3.4	45
68	Effects of annealing on structure of GaAs(001) nanoindentations. <i>Philosophical Magazine Letters</i> , 2003 , 83, 149-158	1	7
67	Strength Enhancement of Compensated Strained InP/AlP Superlattice. <i>Physica Status Solidi A</i> , 2002 , 189, 175-181		2
66	Metal-organic vapor-phase epitaxy of defect-free InGaAs/GaAs quantum dots emitting around 1.3 μ m. <i>Journal of Crystal Growth</i> , 2002 , 235, 89-94	1.6	14
65	Subsurface deformations induced by a Vickers indenter in GaAs/AlGaAs superlattice. <i>Journal of Materials Science Letters</i> , 2002 , 21, 401-404		22
64	Silicon-insulator waveguide photodetector with Ge/Si self-assembled islands. <i>Journal of Applied Physics</i> , 2002 , 92, 1858-1861	2.5	23
63	Microscopic structure and optical properties of GaAs _{1-x} N _x /GaAs(001) interface grown by metalorganic vapor phase epitaxy. <i>Applied Physics Letters</i> , 2002 , 80, 2460-2462	3.4	8
62	Origin of the bimodal distribution of low-pressure metal-organic-vapor-phase-epitaxy grown InGaAs/GaAs quantum dots. <i>Journal of Applied Physics</i> , 2002 , 91, 3859-3863	2.5	14
61	Transmission electron microscopy study of the InP/InGaAs and InGaAs/InP heterointerfaces grown by metalorganic vapor-phase epitaxy. <i>Journal of Applied Physics</i> , 2002 , 92, 5749-5755	2.5	41
60	Influence of the twist angle on the plasticity of the GaAs compliant substrates realized by wafer bonding. <i>Journal of Physics Condensed Matter</i> , 2002 , 14, 12967-12974	1.8	1
59	Low-load deformation of InP under contact loading; comparison with GaAs. <i>Philosophical Magazine A: Physics of Condensed Matter, Structure, Defects and Mechanical Properties</i> , 2002 , 82, 1953-1961		5
58	Low-load deformation of InP under contact loading; comparison with GaAs. <i>Philosophical Magazine A: Physics of Condensed Matter, Structure, Defects and Mechanical Properties</i> , 2002 , 82, 1953-1961		14
57	Plasticity of GaAs compliant substructures. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2001 , 309-310, 478-482	5.3	1
56	New progresses in transparent rare-earth doped glass-ceramics. <i>Optical Materials</i> , 2001 , 16, 255-267	3.3	100
55	Influence of the thermal treatment on the optical and structural properties of 1.3 μ m emitting LP-MOVPE grown InAs/GaAs quantum dots. <i>Optical Materials</i> , 2001 , 17, 263-266	3.3	3

54	Investigations on GaAsSbN/GaAs quantum wells for 1.3–1.55 μm emission. <i>Journal of Crystal Growth</i> , 2001 , 227-228, 553-557	1.6	46
53	In-depth deformation of InP under a Vickers indenter. <i>Journal of Materials Science</i> , 2001 , 36, 1343-1347	4.3	8
52	Deformations of (011) GaAs under concentrated load. <i>Journal of Materials Science Letters</i> , 2001 , 20, 1361-1364	7	
51	Non-linear solid solution strengthening of InGaAs alloy. <i>Journal of Materials Science Letters</i> , 2001 , 20, 43-45		9
50	Twist-bonded compliant substrates for III-V semiconductors heteroepitaxy. <i>Applied Surface Science</i> , 2001 , 178, 134-139	6.7	10
49	Plasticity of GaAs(011) at room temperature under concentrated load. <i>Philosophical Magazine Letters</i> , 2001 , 81, 527-535	1	2
48	Onset of plasticity in a ≈ 5 GaAs compliant structure. <i>Philosophical Magazine Letters</i> , 2001 , 81, 813-822	1	2
47	Structural effects of the thermal treatment on a GaInNAs/GaAs superlattice. <i>Applied Physics Letters</i> , 2001 , 79, 1795-1797	3.4	27
46	Comparison of light- and heavy-ion-irradiated quantum-wells for use as ultrafast saturable absorbers. <i>Applied Physics Letters</i> , 2001 , 79, 2722-2724	3.4	32
45	Bimodal distribution of Indium composition in arrays of low-pressure metalorganic-vapor-phase-epitaxy grown InGaAs/GaAs quantum dots. <i>Applied Physics Letters</i> , 2001 , 79, 2157-2159	3.4	23
44	Normal-incidence (001) second-harmonic generation in ordered Ga _{0.5} In _{0.5} P. <i>Journal of the Optical Society of America B: Optical Physics</i> , 2001 , 18, 81	1.7	6
43	Height dispersion control of InAs/InP quantum dots emitting at 1.55 μm . <i>Applied Physics Letters</i> , 2001 , 78, 1751-1753	3.4	139
42	Devitrification of fluorozirconate glasses: from nucleation to spinodal decomposition. <i>Journal of Non-Crystalline Solids</i> , 2001 , 284, 85-90	3.9	13
41	Plastic behaviour of an AlAs/GaAs superlattice with a short period. <i>Philosophical Magazine Letters</i> , 2001 , 81, 223-231	1	3
40	Nanoindentation of GaAs compliant substrates. <i>Philosophical Magazine A: Physics of Condensed Matter, Structure, Defects and Mechanical Properties</i> , 2000 , 80, 2899-2911		23
39	Room-Temperature Plasticity of InAs. <i>Physica Status Solidi A</i> , 2000 , 179, 153-158		14
38	TEM study of the morphological and compositional instabilities of InGaAsP epitaxial structures. <i>Journal of Crystal Growth</i> , 2000 , 221, 12-19	1.6	14
37	GaAs/GaAs twist-bonding for compliant substrates: interface structure and epitaxial growth. <i>Applied Surface Science</i> , 2000 , 164, 15-21	6.7	15

36	Structural characterisation of transparent oxyfluoride glass-ceramics. <i>Journal of Materials Science</i> , 2000 , 35, 4849-4856	4.3	41
35	Structural characterisation of transparent oxyfluoride glass-ceramics. <i>Journal of Materials Science</i> , 2000 , 35, 4849-4856	4.3	18
34	Deformations induced by a Vickers indenter in InP at room temperature. <i>EPJ Applied Physics</i> , 2000 , 12, 31-36	1.1	12
33	All-optical discrimination at 1.5 [micro sign]m using an ultrafast saturable absorber vertical cavity device. <i>Electronics Letters</i> , 2000 , 36, 1486	1.1	15
32	Step-bunching instability in strained-layer superlattices grown on vicinal substrates. <i>Applied Physics Letters</i> , 2000 , 76, 306-308	3.4	9
31	Ultrafast saturable absorption at 1.55 μ m in heavy-ion-irradiated quantum-well vertical cavity. <i>Applied Physics Letters</i> , 2000 , 76, 1371-1373	3.4	27
30	Strain and composition of capped Ge/Si self-assembled quantum dots grown by chemical vapor deposition. <i>Applied Physics Letters</i> , 2000 , 77, 370-372	3.4	32
29	Ge/Si self-assembled quantum dots grown on Si(001) in an industrial high-pressure chemical vapor deposition reactor. <i>Journal of Applied Physics</i> , 1999 , 86, 1145-1148	2.5	22
28	Transmission electron microscopy observations of low-load indents in GaAs. <i>Philosophical Magazine Letters</i> , 1999 , 79, 805-812	1	42
27	Morphological and Compositional Instabilities of Strained and Unstrained Alloy Layers. <i>Materials Research Society Symposia Proceedings</i> , 1999 , 583, 315		
26	High-quality InAs/GaAs quantum dots grown by low-pressure metalorganic vapor-phase epitaxy. <i>Journal of Crystal Growth</i> , 1998 , 195, 524-529	1.6	5
25	Planar selective regrowth of high resistivity semi-insulating InP(Fe) by LP-MOVPE for buried lasers using TBP. <i>Journal of Crystal Growth</i> , 1998 , 195, 479-484	1.6	1
24	Low-damage dry-etched grating on an MQW active layer and dislocation-free InP regrowth for 1.55- μ m complex-coupled DFB lasers fabrication. <i>IEEE Photonics Technology Letters</i> , 1998 , 10, 1070-1072	2.2	23
23	Optical studies of ultrashort-period GaAs/AlAs superlattices grown on (In,Ga)As pseudosubstrate. <i>Physical Review B</i> , 1998 , 58, R7540-R7543	3.3	1
22	Base metallization stability in InP/InGaAs heterojunction bipolar transistors and its influence on leakage currents. <i>Journal of Vacuum Science & Technology an Official Journal of the American Vacuum Society B, Microelectronics Processing and Phenomena</i> , 1997 , 15, 854		2
21	Anisotropic etching of InP with low sidewall and surface induced damage in inductively coupled plasma etching using SiCl ₄ . <i>Journal of Vacuum Science and Technology A: Vacuum, Surfaces and Films</i> , 1997 , 15, 626-632	2.9	43
20	1.3 μ m strain-compensated InAsP/InGaP electroabsorption modulator structure grown by atmospheric pressure metalorganic vapor epitaxy. <i>Applied Physics Letters</i> , 1997 , 70, 96-98	3.4	17
19	Metal organic vapor phase epitaxy growth of GaAsN on GaAs using dimethylhydrazine and tertiarybutylarsine. <i>Applied Physics Letters</i> , 1997 , 70, 2861-2863	3.4	90

18	Structure of the GaAs/InP interface obtained by direct wafer bonding optimised for surface emitting optical devices. <i>Journal of Applied Physics</i> , 1997 , 82, 4892-4903	2.5	57
17	Study of growth rate and composition variations in metalorganic vapour phase selective area epitaxy at atmospheric pressure and application to the growth of strained layer DBR lasers. <i>Journal of Crystal Growth</i> , 1997 , 170, 639-644	1.6	11
16	Controlled steam oxidation of AlInAs for microelectronics and optoelectronics applications. <i>Journal of Electronic Materials</i> , 1997 , 26, L32-L35	1.9	7
15	Transmission electron microscope observations of dislocations in heteroepitaxial layers of CdTe-(CdHg)Te on GaAs. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 1997 , 45, 76-84	3.1	3
14	Material Flow at the Surface of Indented Indium Phosphide. <i>Physica Status Solidi A</i> , 1997 , 161, 415-427		9
13	Submilliwatt optical bistability in wafer fused vertical cavity at 1.55- μ m wavelength. <i>IEEE Photonics Technology Letters</i> , 1996 , 8, 539-541	2.2	9
12	Inhibition of thickness variations during growth of InAsP/InGaP and InAsP/InGaAsP multiquantum wells with high compensated strains. <i>Applied Physics Letters</i> , 1996 , 69, 2279-2281	3.4	16
11	Kinematic versus dynamic approaches of x-ray diffraction simulation. Application to the characterization of InGaAs/InGaAlAs multiple quantum wells. <i>Journal of Applied Physics</i> , 1996 , 79, 2332-2336	2.5	4
10	Sidewall and surface induced damage comparison between reactive ion etching and inductive plasma etching of InP using a CH ₄ /H ₂ /O ₂ gas mixture. <i>Journal of Vacuum Science and Technology A: Vacuum, Surfaces and Films</i> , 1996 , 14, 1056-1061	2.9	30
9	GaAs substrates for the MOVPE growth of (Hg,Cd)Te layers. <i>Advanced Materials for Optics and Electronics</i> , 1994 , 3, 239-245		6
8	Interphases and mechanical properties in carbon fibres/Al matrix composites. <i>European Physical Journal Special Topics</i> , 1993 , 03, C7-1693-C7-1698		2
7	Imperfections in II-VI semiconductor layers epitaxially grown by organometallic chemical vapour deposition on GaAs. <i>Journal of Crystal Growth</i> , 1993 , 129, 375-384	1.6	10
6	Effect of the orientations and polarities of GaAs substrates CdTe buffer layer structural properties. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 1993 , 16, 145-150	3.1	18
5	Extended defects in II-VI semiconductor heteroepitaxial layers grown on GaAs substrates of various orientations. <i>Physica Status Solidi A</i> , 1993 , 138, 437-443		1
4	Misfit accommodation and dislocations in heteroepitaxial semiconductor layers: II-VI compounds on GaAs. <i>Journal De Physique III</i> , 1993 , 3, 1189-1199		8
3	Thermodynamic analysis of Zn-Cd-Te, Zn-Hg-Te and Cd-Hg-Te: phase separation in Zn _x Cd _{1-x} Te and Zn _x Hg _{1-x} Te. <i>Journal of Crystal Growth</i> , 1992 , 117, 10-15	1.6	49
2	Designing the relative impact of thickness/composition changes in selective area organometallic epitaxy for monolithic integration applications		1
1	Crystal Phase Control during Epitaxial Hybridization of III-V Semiconductors with Silicon. <i>Advanced Electronic Materials</i> , 2100777	6.4	3

