Martin Eickhoff

List of Publications by Year in Descending Order

190 papers	6,458 citations	41 h-index	73 g-index
195 ext. papers	6,991 ext. citations	4.7 avg, IF	5.18 L-index

#	Paper	IF	Citations
190	Comparing Co-catalytic Effects of ZrOx, SmOx, and Pt on COx Methanation over Co-based Catalysts Prepared by Double Flame Spray Pyrolysis. *ChemCatChem*, **2021**, 13, 2815-2831	5.2	1
189	Behavior of the Ga2O3:Sn Evaporation During Laser-Assisted Atom Probe Tomography. *Microscopy and Microanalysis*, **2021**, 27, 687-695	0.5	1
188	Time-resolved cathodoluminescence investigations of AlN:Ge/GaN nanowire structures. *Nano Express*, **2021**, 2, 034001	2	1
187	Surface Microscopy of Atomic and Molecular Hydrogen from Field-Evaporating Semiconductors. *Journal of Physical Chemistry C*, **2021**, 125, 17078-17087	3.8	1
186	4D-STEM at interfaces to GaN: Centre-of-mass approach & NBED-disc detection. *Ultramicroscopy*, **2021**, 228, 113321	3.1	4
185	Rare-Earth-Doped Y4Al2O9 Nanoparticles for Stable Light-Converting Phosphors. *ACS Applied Nano Materials*, **2020**, 3, 699-710	5.6	14
184	Controlled Laser-Thinning of MoS2 Nanolayers and Transformation to Amorphous MoOx for 2D Monolayer Fabrication. *ACS Applied Nano Materials*, **2020**, 3, 7490-7498	5.6	5
183	Luminescence probing of surface adsorption processes using InGaN/GaN nanowire heterostructure arrays **2020**, 239-270		2
182	The Role of Polarity in Nonplanar Semiconductor Nanostructures. *Nano Letters*, **2019**, 19, 3396-3408	11.5	20
181	Electrical Polarization in AlN/GaN Nanodisks Measured by Momentum-Resolved 4D Scanning Transmission Electron Microscopy. *Physical Review Letters*, **2019**, 122, 106102	7.4	17
180	Consistent description of mesoscopic transport: Case study of current-dependent magnetoconductance in single GaN:Ge nanowires. *Physical Review B*, **2019**, 100,	3.3	3
179	Chemically Sensitive Photoluminescence of InGaN/GaN Nanowire Heterostructure Arrays. *Proceedings (mdpi)*, **2019**, 14, 43	0.3	
178	Ion sensitive AlGaN/GaN field-effect transistors with monolithically integrated wheatstone bridge for temperature- and drift compensation in enzymatic biosensors. *Sensors and Actuators B: Chemical*, **2018**, 263, 20-26	8.5	11
177	Optical emission of GaN/AlN quantum-wires - the role of charge transfer from a nanowire template. *Nanoscale*, **2018**, 10, 5591-5598	7.7	8
176	Photoelectrochemical response of GaN, InGaN, and GaNP nanowire ensembles. *Journal of Applied Physics*, **2018**, 123, 175703	2.5	3
175	Flexible Modulation of Electronic Band Structures of Wide Band Gap GaN Semiconductors Using Bioinspired, Nonbiological Helical Peptides. *Advanced Functional Materials*, **2018**, 28, 1704034	15.6	5
174	Dynamic Extracellular Imaging of Biochemical Cell Activity Using InGaN/GaN Nanowire Arrays as Nanophotonic Probes. *Advanced Functional Materials*, **2018**, 28, 1802503	15.6	3

173	Effects of the Fermi level energy on the adsorption of O 2 to monolayer MoS 2. *2D Materials*, **2018**, 5, 045025	5.9	5
172	Synthesis of SnO2 Nanowires Using SnI2 as Precursor and Their Application as High-Performance Self-Powered Ultraviolet Photodetectors. *Physica Status Solidi (B): Basic Research*, **2018**, 255, 1700426	1.3	8
171	Passivation layers for nanostructured photoanodes: ultra-thin oxides on InGaN nanowires. *Journal of Materials Chemistry A*, **2018**, 6, 565-573	13	20
170	Influence of the atom source operating parameters on the structural and optical properties of In xGa 1 xN nanowires grown by plasma-assisted molecular beam epitaxy. *Journal of Applied Physics*, **2018**, 124, 165703	2.5	2
169	Photoluminescence Detection of Surface Oxidation Processes on InGaN/GaN Nanowire Arrays. *ACS Sensors*, **2018**, 3, 2254-2260	9.2	8
168	Suppression of the quantum-confined Stark effect in polar nitride heterostructures. *Communications Physics*, **2018**, 1,	5.4	10
167	Optical Analysis of Oxygen Self-Diffusion in Ultrathin CeO2 Layers at Low Temperatures. *Advanced Energy Materials*, **2018**, 8, 1802120	21.8	2
166	Photoluminescence Probing of Complex HO Adsorption on InGaN/GaN Nanowires. *Nano Letters*, **2017**, 17, 615-621	11.5	16
165	InGaN/GaN nanowires as a new platform for photoelectrochemical sensors - detection of NADH. *Biosensors and Bioelectronics*, **2017**, 94, 298-304	11.8	42
164	Competitive adsorption of air constituents as observed on InGaN/GaN nano-optical probes. *Sensors and Actuators B: Chemical*, **2017**, 250, 91-99	8.5	7
163	Influence of the cluster constituents reactivity on the desorption/ionization process induced by neutral SO clusters. *Journal of Chemical Physics*, **2017**, 146, 134705	3.9	7
162	Bias-Controlled Spectral Response in GaN/AlN Single-Nanowire Ultraviolet Photodetectors. *Nano Letters*, **2017**, 17, 4231-4239	11.5	37
161	Study of the carrier transfer across the GaNP nanowire electrolyte interface by electron paramagnetic spin trapping. *Applied Physics Letters*, **2017**, 110, 222101	3.4	2
160	Bias-Controlled Optical Transitions in GaN/AlN Nanowire Heterostructures. *ACS Nano*, **2017**, 11, 8758-8767	13.7	10
159	Transport mechanisms in SnO2:N,H thin film grown by chemical vapor deposition. *Physica Status Solidi (B): Basic Research*, **2017**, 254, 1700003	1.3	2
158	Evidence for nitrogen-related deep acceptor states in SnO2 grown by chemical vapor deposition. *Journal of Applied Physics*, **2017**, 122, 205702	2.5	3
157	Three dimensional reconstruction of InGaN nanodisks in GaN nanowires: Improvement of the nanowire sample preparation to avoid missing wedge effects. *Journal of Crystal Growth*, **2017**, 475, 202-207	1.6	3
156	3D Investigation of InGaN Nanodisks in GaN Nanowires **2016**, 449-450		

155	Optical manipulation of a multilevel nuclear spin in ZnO: Master equation and experiment. *Physical Review B*, **2016**, 93,	3.3	1
154	Plasma assisted molecular beam epitaxy of Cu2O on MgO(001): Influence of copper flux on epitaxial orientation. *Journal of Crystal Growth*, **2016**, 436, 87-91	1.6	5
153	Luminescent properties of ZnO and ZnMgO epitaxial layers under high hydrostatic pressure. *Journal of Alloys and Compounds*, **2016**, 672, 125-130	5.7	7
152	In situ monitoring of myenteric neuron activity using acetylcholinesterase-modified AlGaN/GaN solution-gate field-effect transistors. *Biosensors and Bioelectronics*, **2016**, 77, 1048-54	11.8	5
151	Nitrogen incorporation in SnO2 thin films grown by chemical vapor deposition. *Physica Status Solidi (B): Basic Research*, **2016**, 253, 1087-1092	1.3	14
150	Short-wavelength, mid- and far-infrared intersubband absorption in nonpolar GaN/Al(Ga)N heterostructures. *Japanese Journal of Applied Physics*, **2016**, 55, 05FG05	1.4	7
149	Hydrogen induced mobility enhancement in RF sputtered Cu2O thin films. *Journal of Applied Physics*, **2016**, 120, 185705	2.5	6
148	Shift of optical absorption edge in SnO2 films with high concentrations of nitrogen grown by chemical vapor deposition. *Journal of Applied Physics*, **2016**, 119, 245703	2.5	13
147	Ge doping of GaN beyond the Mott transition. *Journal Physics D: Applied Physics*, **2016**, 49, 445301	3	31
146	Interfacial properties of self-assembled GaN nanowires on pre-processed Al2O3(0001) surfaces. *Materials Science in Semiconductor Processing*, **2016**, 55, 46-50	4.3	2
145	UV Photosensing Characteristics of Nanowire-Based GaN/AlN Superlattices. *Nano Letters*, **2016**, 16, 3260-7	11.5	41
144	Integration of an opto-chemical detector based on group III-nitride nanowire heterostructures. *Applied Optics*, **2015**, 54, 839-47	1.7	4
143	Self-assembly of ordered wurtzite/rock salt heterostructures□ A new view on phase separation in MgxZn1□xO. *Journal of Applied Physics*, **2015**, 118, 045706	2.5	2
142	Doping-Induced Universal Conductance Fluctuations in GaN Nanowires. *Nano Letters*, **2015**, 15, 7822-8	11.5	13
141	Quantitative analysis of immobilized penicillinase using enzyme-modified AlGaN/GaN field-effect transistors. *Biosensors and Bioelectronics*, **2015**, 64, 605-10	11.8	14
140	Structural and electronic properties of GaN nanowires with embedded InxGa1□xN nanodisks. *Journal of Applied Physics*, **2015**, 118, 034301	2.5	11
139	Effect of Water Vapor and Surface Morphology on the Low Temperature Response of Metal Oxide Semiconductor Gas Sensors. *Materials*, **2015**, 8, 6570-6588	3.5	18
138	Electrical transport properties of Ge-doped GaN nanowires. *Nanotechnology*, **2015**, 26, 135704	3.4	17

137	Long-lived excitons in GaN/AlN nanowire heterostructures. *Physical Review B*, **2015**, 91,	3.3	17
136	Nonpolar m-plane GaN/AlGaN heterostructures with intersubband transitions in the 5-10 THz band. *Nanotechnology*, **2015**, 26, 435201	3.4	23
135	Detection of oxidising gases using an optochemical sensor system based on GaN/InGaN nanowires. *Sensors and Actuators B: Chemical*, **2014**, 197, 87-94	8.5	47
134	Intraband absorption in self-assembled Ge-doped GaN/AlN nanowire heterostructures. *Nano Letters*, **2014**, 14, 1665-73	11.5	29
133	AlGaN/GaN Nanowire Heterostructures **2014**, 1-40		
132	Probing the internal electric field in GaN/AlGaN nanowire heterostructures. *Nano Letters*, **2014**, 14, 5118-22	11.5	22
131	Group III-Nitride Chemical Nanosensors with Optical Readout. *Springer Series on Chemical Sensors and Biosensors*, **2014**, 311-338	2	3
130	Screening of the quantum-confined Stark effect in AlN/GaN nanowire superlattices by germanium doping. *Applied Physics Letters*, **2014**, 104, 102104	3.4	21
129	High Precision, Electrochemical Detection of Reversible Binding of Recombinant Proteins on Wide Bandgap GaN Electrodes Functionalized with Biomembrane Models. *Advanced Functional Materials*, **2014**, 24, 4927-4934	15.6	4
128	Bandgap engineering in a nanowire: self-assembled 0, 1 and 2D quantum structures. *Materials Today*, **2013**, 16, 213-219	21.8	24
127	Nanostructure and strain in InGaN/GaN superlattices grown in GaN nanowires. *Nanotechnology*, **2013**, 24, 435702	3.4	49
126	A review of MBE grown 0D, 1D and 2D quantum structures in a nanowire. *Journal of Materials Chemistry C*, **2013**, 1, 4300	7.1	54
125	Effects of interface geometry on the thermoelectric properties of laterally microstructured ZnO-based thin films. *Physica Status Solidi (A) Applications and Materials Science*, **2013**, 210, 119-124	1.6	5
124	Optical properties of GaN-based nanowires containing a single Al(0.14)Ga(0.86)N/GaN quantum disc. *Nanotechnology*, **2013**, 24, 125201	3.4	10
123	Probing carrier populations in ZnO quantum wells by screening of the internal electric fields. *Physical Review B*, **2013**, 87,	3.3	5
122	Micro-optical system as integration platform for III-N nanowire based opto-chemical detectors **2013**,		3
121	III-nitride nanostructures for optical gas detection and pH sensing **2013**,		4
120	Radical formation at the gallium nitride nanowire-electrolyte interface by photoactivated charge transfer. *Nanotechnology*, **2013**, 24, 325701	3.4	4

119	Contactless electroreflectance studies of free exciton binding energy in Zn1-xMgxO epilayers. *Applied Physics Letters*, **2013**, 103, 251908	3.4	11
118	Germanium doping of self-assembled GaN nanowires grown by plasma-assisted molecular beam epitaxy. *Journal of Applied Physics*, **2013**, 114, 103505	2.5	40
117	Accurate determination of optical bandgap and lattice parameters of Zn1−xMgxO epitaxial films (0≤x≤0.3) grown by plasma-assisted molecular beam epitaxy on a-plane sapphire. *Journal of Applied Physics*, **2013**, 113, 233512	2.5	23
116	InGaN/GaN quantum dots as optical probes for the electric field at the GaN/electrolyte interface. *Journal of Applied Physics*, **2013**, 114, 074313	2.5	4
115	Polarity assignment in ZnTe, GaAs, ZnO, and GaN-AlN nanowires from direct dumbbell analysis. *Nano Letters*, **2012**, 12, 2579-86	11.5	146
114	Bias-enhanced optical pH response of group III-nitride nanowires. *Nano Letters*, **2012**, 12, 6180-6	11.5	56
113	Phonon-assisted luminescence of polar semiconductors: Fröhlich coupling versus deformation-potential scattering. *Physical Review B*, **2012**, 85,	3.3	19
112	Opto-chemical sensor system for the detection of H2 and hydrocarbons based on InGaN/GaN nanowires. *Sensors and Actuators B: Chemical*, **2012**, 173, 120-126	8.5	48
111	Self-assembled GaN quantum wires on GaN/AlN nanowire templates. *Nanoscale*, **2012**, 4, 7517-24	7.7	47
110	Binary copper oxide semiconductors: From materials towards devices. *Physica Status Solidi (B): Basic Research*, **2012**, 249, 1487-1509	1.3	449
109	Growth study of nonpolar Zn1−xMgxO epitaxial films on a-plane bulk ZnO by plasma-assisted molecular beam epitaxy. *Applied Physics Letters*, **2012**, 101, 122106	3.4	4
108	ZnO/(ZnMg)O single quantum wells with high Mg content graded barriers. *Journal of Applied Physics*, **2012**, 111, 113504	2.5	12
107	Electrochemical properties of GaN nanowire electrodes--influence of doping and control by external bias. *Nanotechnology*, **2012**, 23, 165701	3.4	20
106	Intra-excitonic relaxation dynamics in ZnO. *Applied Physics Letters*, **2011**, 99, 231910	3.4	8
105	Optical properties of wurtzite/zinc-blende heterostructures in GaN nanowires. *Journal of Applied Physics*, **2011**, 110, 064313	2.5	57
104	Carrier dynamics in (ZnMg)O alloy materials. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2011**, 8, 1149-1152		1
103	GaN nanodiscs embedded in nanowires as optochemical transducers. *Nanotechnology*, **2011**, 22, 275505	3.4	52
102	Optical properties of MgZnO alloys: Excitons and exciton-phonon complexes. *Journal of Applied Physics*, **2011**, 110, 013520	2.5	46

101	Carrier confinement in GaN/AlxGa1−xN nanowire heterostructures (0. *Physical Review B*, **2011**, 84,	3.3	49
100	Exciton confinement in homo- and heteroepitaxial ZnO/Zn1−xMgxO quantum wells with x . *Journal of Applied Physics*, **2011**, 110, 093513	2.5	25
99	Electron spin resonance of Zn1−xMgxO thin films grown by plasma-assisted molecular beam epitaxy. *Applied Physics Letters*, **2010**, 97, 092102	3.4	5
98	Origin of energy dispersion in AlxGa1−xN/GaN nanowire quantum discs with low Al content. *Physical Review B*, **2010**, 82,	3.3	27
97	Photoluminescence polarization properties of single GaN nanowires containing AlxGa1−xN/GaN quantum discs. *Physical Review B*, **2010**, 81,	3.3	24
96	Photocatalytic cleavage of self-assembled organic monolayers by UV-induced charge transfer from GaN substrates. *Advanced Materials*, **2010**, 22, 2632-6	24	28
95	Investigation of carrier dynamics in Zn1−xMgxO by time-resolved photoluminescence. *Journal of Luminescence*, **2010**, 130, 2256-2259	3.8	15
94	Optical characterization of AlGaN/GaN quantum disc structures in single nanowires. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2010**, 7, 2243-2245		
93	P-type doping of semipolar GaN(11$ bar 2 $2) by plasma-assisted molecular-beam epitaxy. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2010**, 7, 1913-1915		5
92	On the Low-Temperature Response of Semiconductor Gas Sensors. *Journal of Sensors*, **2009**, 2009, 1-17	2	53
91	GaN quantum dots as optical transducers for chemical sensors. *Applied Physics Letters*, **2009**, 94, 113108	3.4	15
90	Optical properties and structural characteristics of ZnMgO grown by plasma assisted molecular beam epitaxy. *Journal of Applied Physics*, **2009**, 105, 023505	2.5	83
89	Mg doping and its effect on the semipolar GaN(112□2) growth kinetics. *Applied Physics Letters*, **2009** , 95, 171908	3.4	16
88	Strain effects and phonon□plasmon coupled modes in Si-doped AlN. *Physica Status Solidi (A) Applications and Materials Science*, **2009**, 206, 1183-1186	1.6	6
87	Analysis of polarization-dependent photoreflectance studies for c -plane GaN films grown on a -plane sapphire. *Physica Status Solidi (A) Applications and Materials Science*, **2009**, 206, 773-779	1.6	4
86	Ultrathin GaN/AlN/GaN solution-gate field effect transistor with enhanced resolution at low source-gate voltage. *Sensors and Actuators B: Chemical*, **2009**, 142, 304-307	8.5	20
85	Gallium nitride electrodes for membrane-based electrochemical biosensors. *European Physical Journal E*, **2009**, 30, 233-8	1.5	13
84	Triple-twin domains in Mg doped GaN wurtzite nanowires: structural and electronic properties of this zinc-blende-like stacking. *Nanotechnology*, **2009**, 20, 145704	3.4	80

83	Optical properties of Si- and Mg-doped gallium nitride nanowires grown by plasma-assisted molecular beam epitaxy. *Journal of Applied Physics*, **2008**, 104, 074309	2.5	89
82	Nucleation and growth of GaN nanorods on Si (111) surfaces by plasma-assisted molecular beam epitaxy - The influence of Si- and Mg-doping. *Journal of Applied Physics*, **2008**, 104, 034309	2.5	127
81	The surface conductivity at the diamond/aqueous electrolyte interface. *Journal of the American Chemical Society*, **2008**, 130, 4177-81	16.4	34
80	Functionalization of 6H-SiC surfaces with organosilanes. *Applied Physics Letters*, **2008**, 92, 153301	3.4	45
79	A novel GaN-based multiparameter sensor system for biochemical analysis. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2008**, 5, 2361-2363		11
78	Gas sensing properties of hydrogen-terminated diamond. *Sensors and Actuators B: Chemical*, **2008**, 133, 156-165	8.5	40
77	. *IEEE Sensors Journal*, **2007**, 7, 1349-1353	4	14
76	Selective etching of AlInN/GaN heterostructures for MEMS technology. *Microelectronic Engineering*, **2007**, 84, 1152-1156	2.5	12
75	Fully unstrained GaN on sacrificial AlN layers by nano-heteroepitaxy. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2007**, 4, 2248-2251		4
74	Modulation spectroscopy of AlGaN/GaN heterostructures: The influence of electron□hole interaction. *Physica Status Solidi (A) Applications and Materials Science*, **2007**, 204, 447-458	1.6	22
73	Fabrication of freestanding GaN microstructures using AlN sacrificial layers. *Physica Status Solidi - Rapid Research Letters*, **2007**, 1, R10-R12	2.5	5
72	SnO2:Sb □A new material for high-temperature MEMS heater applications: Performance and limitations. *Sensors and Actuators B: Chemical*, **2007**, 124, 421-428	8.5	34
71	Stark shift of interband transitions in AlN□GaN superlattices. *Applied Physics Letters*, **2007**, 90, 241906	3.4	8
70	. *IEEE Sensors Journal*, **2007**, 7, 1675-1679	4	17
69	Electroreflectance spectroscopy of Pt□AlGaN□GaN heterostructures exposed to gaseous hydrogen. *Applied Physics Letters*, **2006**, 88, 024101	3.4	15
68	Catalytic activity of enzymes immobilized on AlGaN□GaN solution gate field-effect transistors. *Applied Physics Letters*, **2006**, 89, 183901	3.4	60
67	Impact of silicon incorporation on the formation of structural defects in AlN. *Journal of Applied Physics*, **2006**, 100, 113531	2.5	17
66	Luminescence properties of highly Si-doped AlN. *Applied Physics Letters*, **2006**, 88, 071906	3.4	34

65	New Materials for Chemical and Biosensors. *Materials and Manufacturing Processes*, **2006**, 21, 253-256	4.1	20
64	Direct biofunctionalization of semiconductors: A survey. *Physica Status Solidi (A) Applications and Materials Science*, **2006**, 203, 3424-3437	1.6	139
63	Nearly stress-free substrates for GaN homoepitaxy. *Journal of Crystal Growth*, **2006**, 293, 462-468	1.6	34
62	Recording of cell action potentials with AlGaN□GaN field-effect transistors. *Applied Physics Letters*, **2005**, 86, 033901	3.4	107
61	Phase transition by Mg doping of N-face polarity GaN. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2005**, 2, 2216-2219		2
60	Electrochemical stabilization of crystalline silicon with aromatic self-assembled monolayers in aqueous electrolytes. *Physica Status Solidi (B): Basic Research*, **2005**, 242, 2838-2845	1.3	5
59	Mn-rich clusters in GaN: Hexagonal or cubic symmetry?. *Applied Physics Letters*, **2005**, 86, 131927	3.4	57
58	Highly Si-doped AlN grown by plasma-assisted molecular-beam epitaxy. *Applied Physics Letters*, **2005**, 86, 192108	3.4	37
57	Chemical functionalization of GaN and AlN surfaces. *Applied Physics Letters*, **2005**, 87, 263901	3.4	109
56	Influence of thermal oxidation on the electronic properties of Pt Schottky contacts on GaN grown by molecular-beam epitaxy. *Applied Physics Letters*, **2005**, 86, 083507	3.4	12
55	Determination of the polarization discontinuity at the AlGaN□GaN interface by electroreflectance spectroscopy. *Applied Physics Letters*, **2005**, 86, 181912	3.4	25
54	Electron injection-induced effects in Mn-doped GaN. *Journal of Applied Physics*, **2004**, 96, 3556-3558	2.5	13
53	Structural and interface properties of an AlN diamond ultraviolet light emitting diode. *Applied Physics Letters*, **2004**, 85, 3699-3701	3.4	13
52	Piezoresistive properties of single crystalline, polycrystalline, and nanocrystalline n-type 3C-SiC. *Journal of Applied Physics*, **2004**, 96, 2872-2877	2.5	33
51	Polytype transition of N-face GaN:Mg from wurtzite to zinc-blende. *Journal of Applied Physics*, **2004**, 96, 3709-3715	2.5	16
50	Influence of crystal defects on the piezoresistive properties of 3C□SiC. *Journal of Applied Physics*, **2004**, 96, 2878-2888	2.5	21
49	Direct Observation of Mn Clusters in GaN by X-ray Scanning Microscopy. *Japanese Journal of Applied Physics*, **2004**, 43, L695-L697	1.4	11
48	Improved 3C-SiC Films Epitaxially Grown on Si by Flash Lamp Processing. *Journal of the Electrochemical Society*, **2004**, 151, G136	3.9	16

47	Vertical transport in group III-nitride heterostructures and application in AlN/GaN resonant tunneling diodes. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2004**, 1, 2210-2227		45
46	Photoreflectance studies of (Al)Ga- and N-face AlGaN/GaN heterostructures. *Thin Solid Films*, **2004**, 450, 155-158	2.2	18
45	Temperature-dependent electric fields in GaN Schottky diodes studied by electroreflectance. *Thin Solid Films*, **2004**, 450, 163-166	2.2	1
44	Anisotropic propagation of surface acoustic waves on nitride layers. *Superlattices and Microstructures*, **2004**, 36, 815-823	2.8	10
43	Influence of crystal quality on the electronic properties of n-type 3C-SiC grown by low temperature low pressure chemical vapor deposition. *Journal of Applied Physics*, **2004**, 95, 7908-7917	2.5	23
42	High quality heteroepitaxial AlN films on diamond. *Journal of Applied Physics*, **2004**, 96, 895-902	2.5	38
41	AlxGa1□NA New Material System for Biosensors. *Advanced Functional Materials*, **2003**, 13, 841-846	15.6	135
40	Electronics and sensors based on pyroelectric AlGaN/GaN heterostructures. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2003**, 1878-1907		56
39	Electronics and sensors based on pyroelectric AlGaN/GaN heterostructures □Part B: Sensor applications. *Physica Status Solidi C: Current Topics in Solid State Physics*, **2003**, 1908-1918		113
38	Influence of surface oxides on hydrogen-sensitive Pd:GaN Schottky diodes. *Applied Physics Letters*, **2003**, 83, 773-775	3.4	89
37	pH response of GaN surfaces and its application for pH-sensitive field-effect transistors. *Applied Physics Letters*, **2003**, 83, 177-179	3.4	243
36	AlN/Diamond np-junctions. *Diamond and Related Materials*, **2003**, 12, 1873-1876	3.5	22
35	AlN/diamond heterojunction diodes. *Applied Physics Letters*, **2003**, 82, 290-292	3.4	84
34	Hydrosilylation of crystalline silicon (111) and hydrogenated amorphous silicon surfaces: A comparative x-ray photoelectron spectroscopy study. *Journal of Applied Physics*, **2003**, 94, 2289-2294	2.5	44
33	Exciton quenching in Pt/GaN Schottky diodes with Ga- and N-face polarity. *Applied Physics Letters*, **2003**, 82, 1712-1714	3.4	16
32	Nanotechnology for SAW devices on AlN epilayers. *Materials Science and Engineering B: Solid-State Materials for Advanced Technology*, **2002**, 93, 154-158	3.1	28
31	Group III-nitride-based gas sensors for combustion monitoring. *Materials Science and Engineering B: Solid-State Materials for Advanced Technology*, **2002**, 93, 207-214	3.1	72
30	Observation of ion-induced changes in the channel current of high electron mobility AlGaN/GaN transistors (HEMT). *Materials Science and Engineering B: Solid-State Materials for Advanced Technology*, **2002**, 93, 143-146	3.1	15

29	Gas sensitive GaN/AlGaN-heterostructures. *Sensors and Actuators B: Chemical*, **2002**, 87, 425-430	8.5	155
28	Thermal stability of Pt- and Ni-based Schottky contacts on GaN and Al0.31Ga0.69N. *Semiconductor Science and Technology*, **2002**, 17, L47-L54	1.8	38
27	Pyroelectric properties of Al(In)GaN/GaN hetero- and quantum well structures. *Journal of Physics Condensed Matter*, **2002**, 14, 3399-3434	1.8	689
26	Hydrogen response mechanism of Pt□GaN Schottky diodes. *Applied Physics Letters*, **2002**, 80, 1222-1224	3.4	169
25	GaN-based heterostructures for sensor applications. *Diamond and Related Materials*, **2002**, 11, 886-891	3.5	130
24	Etching characteristics and mechanical properties of a-SiC:H thin films. *Sensors and Actuators A: Physical*, **2001**, 94, 87-94	3.9	32
23	A highly stable SiC based microhotplate NO2 gas-sensor. *Sensors and Actuators B: Chemical*, **2001**, 78, 216-220	8.5	26
22	Playing with Polarity. *Physica Status Solidi (B): Basic Research*, **2001**, 228, 505-512	1.3	148
21	Wetting Behaviour of GaN Surfaces with Ga- or N-Face Polarity. *Physica Status Solidi (B): Basic Research*, **2001**, 228, 519-522	1.3	41
20	Piezoresistivity of AlxGa1□N layers and AlxGa1□N/GaN heterostructures. *Journal of Applied Physics*, **2001**, 90, 3383-3386	2.5	40
19	The beneficial role of flash lamp annealing on the epitaxial growth of the 3C□SiC on Si. *Applied Surface Science*, **2001**, 184, 377-382	6.7	9
18	A new SiC/HfB2 based low power gas sensor. *Sensors and Actuators B: Chemical*, **2001**, 77, 111-115	8.5	18
17	Suppression of Si Cavities at the SiC/Si Interface during Epitaxial Growth of 3C-SiC on Silicon-on-Insulator. *Journal of the Electrochemical Society*, **2001**, 148, G16	3.9	13
16	Oxidation Dependence on Defect Density in 3C-SiC Films. *Journal of the Electrochemical Society*, **2001**, 148, G336	3.9	16
15	Novel Sensor Applications of group-III nitrides. *Materials Research Society Symposia Proceedings*, **2001**, 693, 253		1
14	Combustion Pressure Based Engine Management System **2000**,		29
13	SOL thickness dependence of residual strain in SOI material. *Electronics Letters*, **1999**, 35, 1284	1.1	10
12	Selective growth of high-quality 3C-SiC using a SiO 2 sacrificial-layer technique. *Thin Solid Films*, **1999**, 345, 197-199	2.2	10

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