

Antoni Rogalski

List of Publications by Year in descending order

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288
papers

11,599
citations

61984
43
h-index

31849
101
g-index

296
all docs

296
docs citations

296
times ranked

7859
citing authors

#	ARTICLE	IF	CITATIONS
1	Semiconductor ultraviolet detectors. <i>Journal of Applied Physics</i> , 1996, 79, 7433-7473.	2.5	1,340
2	Infrared detectors: status and trends. <i>Progress in Quantum Electronics</i> , 2003, 27, 59-210.	7.0	960
3	HgCdTe infrared detector material: history, status and outlook. <i>Reports on Progress in Physics</i> , 2005, 68, 2267-2336.	20.1	787
4	Third-generation infrared photodetector arrays. <i>Journal of Applied Physics</i> , 2009, 105, .	2.5	672
5	Infrared detectors: an overview. <i>Infrared Physics and Technology</i> , 2002, 43, 187-210.	2.9	606
6	Recent progress in infrared detector technologies. <i>Infrared Physics and Technology</i> , 2011, 54, 136-154.	2.9	419
7	History of infrared detectors. <i>Opto-electronics Review</i> , 2012, 20, .	2.4	309
8	Terahertz detectors and focal plane arrays. <i>Opto-electronics Review</i> , 2011, 19, .	2.4	260
9	THz detectors. <i>Progress in Quantum Electronics</i> , 2010, 34, 278-347.	7.0	258
10	Quantum well photoconductors in infrared detector technology. <i>Journal of Applied Physics</i> , 2003, 93, 4355-4391.	2.5	251
11	Quantum-dot infrared photodetectors: Status and outlook. <i>Progress in Quantum Electronics</i> , 2008, 32, 89-120.	7.0	227
12	Progress in focal plane array technologies. <i>Progress in Quantum Electronics</i> , 2012, 36, 342-473.	7.0	209
13	New concepts in infrared photodetector designs. <i>Applied Physics Reviews</i> , 2014, 1, 041102.	11.3	205
14	InAs/GaSb type-II superlattice infrared detectors: Future prospect. <i>Applied Physics Reviews</i> , 2017, 4, .	11.3	188
15	Challenges of small-pixel infrared detectors: a review. <i>Reports on Progress in Physics</i> , 2016, 79, 046501.	20.1	179
16	Intrinsic infrared detectors. <i>Progress in Quantum Electronics</i> , 1988, 12, 87-289.	7.0	158
17	InAs/GaInSb superlattices as a promising material system for third generation infrared detectors. <i>Infrared Physics and Technology</i> , 2006, 48, 39-52.	2.9	124
18	Infrared Detectors for the Future. <i>Acta Physica Polonica A</i> , 2009, 116, 389-406.	0.5	111

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19	Uncooled long wavelength infrared photon detectors. <i>Infrared Physics and Technology</i> , 2004, 46, 115-131.	2.9	107
20	High-Operating-Temperature Infrared Photodetectors. , 2007, , .		105
21	Two-dimensional infrared and terahertz detectors: Outlook and status. <i>Applied Physics Reviews</i> , 2019, 6, .	11.3	94
22	Analysis of the ROA product in n+p Hg _{1-x} CdTe photodiodes. <i>Infrared Physics</i> , 1988, 28, 139-153.	0.5	88
23	Sensing Infrared Photons at Room Temperature: From Bulk Materials to Atomic Layers. <i>Small</i> , 2019, 15, e1904396.	10.0	83
24	HOT infrared photodetectors. <i>Opto-electronics Review</i> , 2013, 21, .	2.4	81
25	Barrier infrared detectors. <i>Opto-electronics Review</i> , 2014, 22, .	2.4	81
26	Type-II superlattice photodetectors versus HgCdTe photodiodes. <i>Progress in Quantum Electronics</i> , 2019, 68, 100228.	7.0	81
27	Two-dimensional analysis of double-layer heterojunction HgCdTe photodiodes. <i>IEEE Transactions on Electron Devices</i> , 2001, 48, 1326-1332.	3.0	79
28	Photovoltaic effects in GaN structures with p-n junctions. <i>Applied Physics Letters</i> , 1995, 67, 2028-2030.	3.3	78
29	Kinetics of photoconductivity in n-type GaN photodetector. <i>Applied Physics Letters</i> , 1995, 67, 3792-3794.	3.3	77
30	Toward third generation HgCdTe infrared detectors. <i>Journal of Alloys and Compounds</i> , 2004, 371, 53-57.	5.5	76
31	Material considerations for third generation infrared photon detectors. <i>Infrared Physics and Technology</i> , 2007, 50, 240-252.	2.9	74
32	New material systems for third generation infrared photodetectors. <i>Opto-electronics Review</i> , 2008, 16, .	2.4	69
33	HgCdTe barrier infrared detectors. <i>Progress in Quantum Electronics</i> , 2016, 47, 1-18.	7.0	66
34	InAs _{1-x} Sb _x infrared detectors. <i>Progress in Quantum Electronics</i> , 1989, 13, 191-231.	7.0	63
35	Infrared Devices And Techniques (Revision). <i>Metrology and Measurement Systems</i> , 2014, 21, 565-618.	1.4	61
36	Hg(1-x)MnxTe as a new infrared detector material. <i>Infrared Physics</i> , 1991, 31, 117-166.	0.5	60

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37	Next decade in infrared detectors. , 2017, , .		54
38	Comparison of the performance of quantum well and conventional bulk infrared photodetectors. Infrared Physics and Technology, 1997, 38, 295-310.	2.9	53
39	Graphene-based materials in the infrared and terahertz detector families: a tutorial. Advances in Optics and Photonics, 2019, 11, 314.	25.5	53
40	Progress in MOCVD growth of HgCdTe heterostructures for uncooled infrared photodetectors. Infrared Physics and Technology, 2007, 49, 173-182.	2.9	50
41	Band-to-band recombination in $\text{InAs}_{1-x}\text{Sbx}$. Infrared Physics, 1985, 25, 551-560.	0.5	48
42	Trends in Performance Limits of the HOT Infrared Photodetectors. Applied Sciences (Switzerland), 2021, 11, 501.	2.5	48
43	Assessment of quantum dot infrared photodetectors for high temperature operation. Journal of Applied Physics, 2008, 104, 034314.	2.5	47
44	<title>Narrow-gap semiconductor photodiodes</title>. , 1998, , .		46
45	Assessment of HgCdTe photodiodes and quantum well infrared photoconductors for long wavelength focal plane arrays. Infrared Physics and Technology, 1999, 40, 279-294.	2.9	46
46	Effect of dislocations on performance of LWIR HgCdTe photodiodes. Journal of Electronic Materials, 2000, 29, 736-741.	2.2	46
47	InAsSb-Based Infrared Photodetectors: Thirty Years Later On. Sensors, 2020, 20, 7047.	3.8	46
48	Narrow-Gap Semiconductor Photodiodes. , 2000, , .		46
49	Competitive technologies of third generation infrared photon detectors. Opto-electronics Review, 2006, 14, .	2.4	45
50	Engineering the Bandgap of Unipolar HgCdTe-Based nBn Infrared Photodetectors. Journal of Electronic Materials, 2015, 44, 158-166.	2.2	42
51	New generation of infrared photodetectors. Sensors and Actuators A: Physical, 1998, 67, 146-152.	4.1	40
52	Heterostructure infrared photovoltaic detectors. Infrared Physics and Technology, 2000, 41, 213-238.	2.9	38
53	Enhanced numerical analysis of current-voltage characteristics of long wavelength infrared n-on-p HgCdTe photodiodes. Journal of Applied Physics, 2010, 108, .	2.5	36
54	Antimonide-based Infrared Detectors: A New Perspective. , 2018, , .		36

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55	New trends in semiconductor infrared detectors. <i>Optical Engineering</i> , 1994, 33, 1395.	1.0	35
56	Modelling of MWIR HgCdTe complementary barrier HOT detector. <i>Solid-State Electronics</i> , 2013, 80, 96-104.	1.4	35
57	Semiconductor ultraviolet detectors. , 1996, , .		33
58	Simplified model of dislocations as a SRH recombination channel in the HgCdTe heterostructures. <i>Infrared Physics and Technology</i> , 2012, 55, 98-107.	2.9	32
59	Hg _{1-x} Zn _x Te as a potential infrared detector material. <i>Progress in Quantum Electronics</i> , 1989, 13, 299-353.	7.0	30
60	Intrinsic carrier concentration and effective masses in InAs _{1-x} Sbx. <i>Infrared Physics</i> , 1989, 29, 35-42.	0.5	30
61	Performance of mercury cadmium telluride photoconductive detectors. <i>Infrared Physics</i> , 1991, 31, 543-554.	0.5	30
62	Long-wavelength HgCdTe photodiodes: n+ versus p+ structures. <i>Journal of Applied Physics</i> , 1995, 77, 3505-3512.	2.5	30
63	Performance limitation of short wavelength infrared InGaAs and HgCdTe photodiodes. <i>Journal of Electronic Materials</i> , 1999, 28, 630-636.	2.2	30
64	Comment on "Temperature limits on infrared detectivities of InAs/In _x Ga _{1-x} Sb superlattices and bulk Hg _{1-x} Cd _x Te". [J. Appl. Phys. 74, 4774 (1993)]. <i>Journal of Applied Physics</i> , 1996, 80, 2542-2544.	2.5	29
65	Computer modeling of dual-band HgCdTe photovoltaic detectors. <i>Journal of Applied Physics</i> , 2001, 90, 1286-1291.	2.5	29
66	Performance modeling of MWIR InAs/GaSb/B _x Al _{0.2} Ga _{0.8} Sb type-II superlattice nBn detector. <i>Semiconductor Science and Technology</i> , 2012, 27, 055002.	2.0	28
67	Semiconductor detectors and focal plane arrays for far-infrared imaging. <i>Opto-electronics Review</i> , 2013, 21, .	2.4	28
68	Mid-wavelength infrared type-II InAs/GaSb superlattice interband cascade photodetectors. <i>Optical Engineering</i> , 2014, 53, 043107.	1.0	28
69	Narrow-Gap Semiconductor Materials. , 2000, , .		28
70	MOCVD grown HgCdTe device structure for ambient temperature LWIR detectors. <i>Semiconductor Science and Technology</i> , 2013, 28, 105017.	2.0	27
71	MWIR barrier detectors versus HgCdTe photodiodes. <i>Infrared Physics and Technology</i> , 2015, 70, 125-128.	2.9	27
72	Third-generation infrared photon detectors. <i>Optical Engineering</i> , 2003, 42, 3498.	1.0	26

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73	The bulk generation-recombination processes and the carrier lifetime in mid-wave infrared and long-wave infrared liquid nitrogen cooled HgCdTe alloys. <i>Journal of Applied Physics</i> , 2012, 112, .	2.5	26
74	InAs/GaSb type-II superlattice infrared detectors: three decades of development. <i>Proceedings of SPIE</i> , 2017, , .	0.8	26
75	Near room-temperature InAsSb photodiodes: Theoretical predictions and experimental data. <i>Solid-State Electronics</i> , 1996, 39, 1593-1600.	1.4	25
76	Insight into performance of quantum dot infrared photodetectors. <i>Bulletin of the Polish Academy of Sciences: Technical Sciences</i> , 2009, 57, .	0.8	25
77	Numerical Estimations of Carrier Generationâ€“Recombination Processes and the Photon Recycling Effect in HgCdTe Heterostructure Photodiodes. <i>Journal of Electronic Materials</i> , 2012, 41, 2766-2774.	2.2	25
78	Intrinsic carrier concentrations and effective masses in the potential infrared detector material, Hg _{1-x} Zn _x Te. <i>Infrared Physics</i> , 1988, 28, 101-107.	0.5	24
79	MOCVD Grown HgCdTe Barrier Structures for HOT Conditions (July 2014). <i>IEEE Transactions on Electron Devices</i> , 2014, 61, 3803-3807.	3.0	23
80	Infrared devices and techniques. , 2017, , 633-686.		23
81	New insights into the ultimate performance of HgCdTe photodiodes. <i>Sensors and Actuators A: Physical</i> , 2022, 339, 113511.	4.1	23
82	Demonstration of HOT LWIR T2SLs InAs/InAsSb photodetectors grown on GaAs substrate. <i>Infrared Physics and Technology</i> , 2018, 95, 222-226.	2.9	22
83	Effect of structure on the quantum efficiency and ROA product of lead-tin chalcogenide photodiodes. <i>Infrared Physics</i> , 1982, 22, 199-208.	0.5	21
84	Theoretical Modeling of HOT HgCdTe Barrier Detectors for the Mid-Wave Infrared Range. <i>Journal of Electronic Materials</i> , 2013, 42, 3309-3319.	2.2	21
85	Performance prediction of p-i-n HgCdTe long-wavelength infrared HOT photodiodes. <i>Applied Optics</i> , 2018, 57, D11.	1.8	21
86	New trends in infrared detector technology. <i>Infrared Physics and Technology</i> , 1994, 35, 1-21.	2.9	19
87	MOCVD HgCdTe heterostructures for uncooled infrared photodetectors. , 2005, , .		19
88	Interfacial Misfit Array Technique for GaSb Growth on GaAs (001) Substrate by Molecular Beam Epitaxy. <i>Journal of Electronic Materials</i> , 2018, 47, 299-304.	2.2	19
89	Enhanced Performance of HgCdTe Midwavelength Infrared Electron Avalanche Photodetectors With Guard Ring Designs. <i>IEEE Transactions on Electron Devices</i> , 2020, 67, 542-546.	3.0	19
90	Performance of p+â€“n HgCdTe photodiodes. <i>Infrared Physics</i> , 1992, 33, 463-473.	0.5	18

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91	Semiconductor superlattices and quantum wells for infrared optoelectronics. <i>Progress in Quantum Electronics</i> , 1993, 17, 93-164.	7.0	18
92	Numerical estimations of carrier generation-recombination processes and photon recycling effect in 3-<math>\int_{m_{\mu}}^{\infty} \frac{1}{x^2} dx</math>. <i>Optical Engineering</i> , 2011, 50, 061003.	1.0	18
93	Enhanced Performance of HgCdTe Long-Wavelength Infrared Photodetectors With nBn Design. <i>IEEE Transactions on Electron Devices</i> , 2020, 67, 2001-2007.	3.0	18
94	Comparison of performance of quantum dot and other types of infrared photodetectors. <i>Proceedings of SPIE</i> , 2008, , .	0.8	17
95	Recent progress in third generation infrared detectors. <i>Journal of Modern Optics</i> , 2010, 57, 1716-1730.	1.3	17
96	Improvement in performance of high-operating temperature HgCdTe photodiodes. <i>Infrared Physics and Technology</i> , 2011, 54, 310-315.	2.9	17
97	Performance limits of the mid-wave InAsSb/AlAsSb nBn HOT infrared detector. <i>Optical and Quantum Electronics</i> , 2014, 46, 581-591.	3.3	17
98	Photon recycling effect in small pixel p-i-n HgCdTe long wavelength infrared photodiodes. <i>Infrared Physics and Technology</i> , 2019, 97, 38-42.	2.9	17
99	Engineering steps for optimizing high temperature LWIR HgCdTe photodiodes. <i>Infrared Physics and Technology</i> , 2017, 81, 276-281.	2.9	16
100	<title>New ternary alloy systems for infrared detectors</title>., 1993, , .		15
101	Modeling of midwavelength infrared InAs/GaSb type II superlattice detectors. <i>Optical Engineering</i> , 2013, 52, 061307.	1.0	15
102	Performance comparison of barrier detectors and HgCdTe photodiodes. <i>Optical Engineering</i> , 2014, 53, 106105.	1.0	15
103	Investigation of a near mid-gap trap energy level in mid-wavelength infrared InAs/GaSb type-II superlattices. <i>Semiconductor Science and Technology</i> , 2015, 30, 115004.	2.0	15
104	Molecular beam epitaxial growth and characterization of InAs layers on GaAs (001) substrate. <i>Optical and Quantum Electronics</i> , 2016, 48, 1.	3.3	15
105	Low-temperature growth of GaSb epilayers on GaAs (001) by molecular beam epitaxy. <i>Opto-electronics Review</i> , 2016, 24, .	2.4	15
106	Optimization of the interfacial misfit array growth mode of GaSb epilayers on GaAs substrate. <i>Journal of Crystal Growth</i> , 2018, 483, 26-30.	1.5	15
107	Investigation of surface leakage current in MWIR HgCdTe and InAsSb barrier detectors. <i>Semiconductor Science and Technology</i> , 2018, 33, 125010.	2.0	15
108	Bandgap energy determination of InAsSb epilayers grown by molecular beam epitaxy on GaAs substrates. <i>Progress in Natural Science: Materials International</i> , 2019, 29, 472-476.	4.4	15

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109	Theoretical modeling of InAsSb/AlAsSb barrier detectors for higher-operation-temperature conditions. <i>Optical Engineering</i> , 2014, 53, 017106.	1.0	14
110	Mid-Wavelength Infrared nBn for HOT Detectors. <i>Journal of Electronic Materials</i> , 2014, 43, 2963-2969.	2.2	14
111	Demonstration of the Very Long Wavelength Infrared Type-II Superlattice InAs/InAsSb GaAs Immersed Photodetector Operating at Thermoelectric Cooling. <i>IEEE Electron Device Letters</i> , 2019, 40, 1396-1398.	3.9	14
112	Interband Quantum Cascade Infrared Photodetectors: Current Status and Future Trends. <i>Physical Review Applied</i> , 2022, 17, .	3.8	14
113	<title>Infrared thermal detectors versus photon detectors: I. Pixel performance</title>. , 1997, , .		13
114	HgCdTe buried multi-junction photodiodes fabricated by the liquid phase epitaxy. <i>Infrared Physics and Technology</i> , 2002, 43, 157-163.	2.9	13
115	Modeling of HgCdTe LWIR detector for high operation temperature conditions. <i>Metrology and Measurement Systems</i> , 2013, 20, 159-170.	1.4	13
116	Mid-wave T2SLs InAs/GaSb single pixel PIN detector with GaAs immersion lens for HOT condition. <i>Solid-State Electronics</i> , 2016, 119, 1-4.	1.4	13
117	Mercury Cadmium Telluride Photodiodes at the Beginning of the Next Millennium (Review Paper). <i>Defence Science Journal</i> , 2001, 51, 5-34.	0.8	13
118	Guest Editorial: Special Section on Semiconductor Infrared Detectors. <i>Optical Engineering</i> , 1994, 33, 1392.	1.0	12
119	Generation-Recombination Effect in High-Temperature HgCdTe Heterostructure Nonequilibrium Photodiodes. <i>Journal of Electronic Materials</i> , 2009, 38, 1666-1676.	2.2	12
120	1/f Noise in Mid-Wavelength Infrared Detectors With InAs/GaSb Superlattice Absorber. <i>IEEE Transactions on Electron Devices</i> , 2015, 62, 2022-2026.	3.0	12
121	Status of HgCdTe Barrier Infrared Detectors Grown by MOCVD in Military University of Technology. <i>Journal of Electronic Materials</i> , 2016, 45, 4563-4573.	2.2	12
122	HgCdTe photodetectors. , 2020, , 235-335.		12
123	Detectivities of WS ₂ /HfS ₂ heterojunctions. <i>Nature Nanotechnology</i> , 2022, 17, 217-219.	31.5	12
124	Temperature dependence of the RoA product for lead chalcogenide photovoltaic detectors. <i>Infrared Physics</i> , 1981, 21, 191-199.	0.5	11
125	New material systems for third generation infrared detectors. , 2009, , .		11
126	Control of acceptor doping in MOCVD HgCdTe epilayers. <i>Opto-electronics Review</i> , 2010, 18, .	2.4	11

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127	High frequency response of near-room temperature LWIR HgCdTe heterostructure photodiodes. Opto-electronics Review, 2010, 18, .	2.4	11
128	Dark current modeling of MWIR type-II superlattice detectors. , 2012, , .		11
129	Theoretical modeling of long wavelengthn+â€onâ€pHgCdTe photodiodes. Journal of Applied Physics, 1996, 80, 2483-2489.	2.5	10
130	Comparison of photon and thermal detector performance. , 2002, , 5-81.		10
131	Competitive technologies for third generation infrared photon detectors. , 2006, , .		10
132	Modeling of InAsSb/AlAsSb nBn HOT detector's performance limit. Proceedings of SPIE, 2013, , .	0.8	10
133	Electrical Properties of Midwave and Longwave InAs/GaSb Superlattices Grown on GaAs Substrates by Molecular Beam Epitaxy. Nanoscale Research Letters, 2018, 13, 196.	5.7	10
134	Modeling of HOT (111) HgCdTe MWIR detector for fast response operation. Optical and Quantum Electronics, 2014, 46, 1303-1312.	3.3	9
135	Recent progress in MOCVD growth for thermoelectrically cooled HgCdTe medium wavelength infrared photodetectors. Solid-State Electronics, 2016, 118, 61-65.	1.4	9
136	Investigation on the InAs _{1-x} Sb _x epilayers growth on GaAs (001) substrate by molecular beam epitaxy. Journal of Semiconductors, 2018, 39, 033003.	3.7	9
137	Detectivity limits for PbTe photovoltaic detectors. Infrared Physics, 1980, 20, 223-229.	0.5	8
138	Influence of dislocations on the performance of Hg _{1-x} CdxTe graded gap photoresistors. Infrared Physics, 1988, 28, 279-286.	0.5	8
139	A modified hot wall epitaxy technique for the growth of CdTe and Hg _{1-x} CdxTe epitaxial layers. Thin Solid Films, 1990, 191, 239-245.	1.8	8
140	Dual-band infrared detectors. , 2000, 3948, 17.		8
141	Infrared detectors at the beginning of the next millennium. , 2001, , .		8
142	Analysis of the response time in high-temperature LWIR HgCdTe photodiodes operating in non-equilibrium mode. Infrared Physics and Technology, 2013, 61, 162-166.	2.9	8
143	Locallyâ€Strainâ€Induced Heavyâ€Holeâ€Band Splitting Observed in Mobility Spectrum of pâ€Type InAs Grown on GaAs. Physica Status Solidi - Rapid Research Letters, 2020, 14, 1900604.	2.4	8
144	The Intrinsic Carrier Concentration in Pb _{1-x} SnxTe, Pb _{1-x} SnxSe, and PbS _{1-x} Sex. Physica Status Solidi A, 1989, 111, 559-565.	1.7	7

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145	The performance of $Hg_{1-x}Zn_xTe$ photodiodes. <i>Applied Physics A: Solids and Surfaces</i> , 1990, 50, 379-384.	1.4	7	
146	Performance of p-n HgCdTe photodiodes. <i>Semiconductor Science and Technology</i> , 1993, 8, S289-S292.	2.0	7	
147	Computer simulation of HgCdTe photovoltaic devices based on complex heterostructures. , 1999, 3629, 74.		7	
148	Insight on quantum dot infrared photodetectors. <i>Journal of Physics: Conference Series</i> , 2009, 146, 012030.	0.4	7	
149	Surface smoothness improvement of HgCdTe layers grown by MOCVD. <i>Bulletin of the Polish Academy of Sciences: Technical Sciences</i> , 2009, 57, .	0.8	7	
150	Near-room temperature MWIR HgCdTe photodiodes limited by vacancies and dislocations related to Shockley-Read-Hall centres. <i>Solid-State Electronics</i> , 2011, 63, 8-8.	1.4	7	
151	Doing Hirsch proud; shaping H-index in engineering sciences. <i>Bulletin of the Polish Academy of Sciences: Technical Sciences</i> , 2013, 61, 5-21.	0.8	7	
152	Fundamental limits of MWIR HgCdTe barrier detectors operating under non-equilibrium mode. <i>Solid-State Electronics</i> , 2014, 100, 20-26.	1.4	7	
153	MOCVD grown HgCdTe barrier detectors for MWIR high-operating temperature operation. <i>Optical Engineering</i> , 2015, 54, 105105.	1.0	7	
154	Higher Operating Temperature IR Detectors of the MOCVD Grown HgCdTe Heterostructures. <i>Journal of Electronic Materials</i> , 2020, 49, 6908-6917.	2.2	7	
155	Studies of Dark Current Reduction in InAsSb Mid-Wave Infrared HOT Detectors through Two Step Passivation Technique. <i>Acta Physica Polonica A</i> , 2017, 132, 325-328.	0.5	7	
156	Photovoltaic detectors $Pb_{1-x}Sn_xTe$ ($0 \leq x \leq 0.25$). Minority carrier lifetimes. Resistance-area product. <i>Infrared Physics</i> , 1981, 21, 1-8.	0.5	6	
157	Photovoltaic detectors $Pb_{1-x}Sn_xSe$ ($0 \leq x \leq 0.12$). Minority carrier lifetimes. Resistance-area product. <i>Infrared Physics</i> , 1981, 21, 251-259.	0.5	6	
158	Calculation of the intrinsic carrier concentration in $InAs_{1-x}Sb_x$. <i>Physica Status Solidi (B): Basic Research</i> , 1986, 135, K85.	1.5	6	
159	Calculation of the carrier lifetime in $Hg_{1-x}ZnxTe$. <i>Infrared Physics</i> , 1988, 28, 311-319.	0.5	6	
160	The performance of $Hg_{1-x}MnxTe$ photodiodes. <i>Infrared Physics</i> , 1989, 29, 887-893.	0.5	6	
161	Comparison of performance limits of infrared detector materials. , 2002, 4650, 117.		6	
162	Numerical modeling of fluctuation phenomena in semiconductors and detailed noise study of mid-wave infrared HgCdTe-heterostructure devices. <i>Journal of Electronic Materials</i> , 2002, 31, 677-682.	2.2	6	

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163	Improvements in MOCVD growth of Hg $1-x$ Cd x Te heterostructures for uncooled infrared photodetectors. , 2005, , .	6	
164	Electrical and optical performance of midwave infrared InAsSb heterostructure detectors. Optical Engineering, 2018, 57, 1.	1.0	6
165	Influence of air on the electrical properties of Pb $1-x$ SnxTe layers on a mica substrate. Thin Solid Films, 1980, 74, 59-68.	1.8	5
166	<title>AlGaN ultraviolet detectors</title>. , 1997, , .		5
167	Uncooled long-wavelength infrared photon detectors. , 2004, , .		5
168	Enhanced numerical analysis of three-color HgCdTe detectors. , 2007, , .		5
169	Numerical analysis of three-colour HgCdTe detectors. Opto-electronics Review, 2007, 15, .	2.4	5
170	Investigation of hillocks formation on (1 0 0) HgCdTe layers grown by MOCVD on GaAs epi-ready substrates. Infrared Physics and Technology, 2017, 84, 87-93.	2.9	5
171	Response time improvement of LWIR HOT MCT detectors. Proceedings of SPIE, 2017, , .	0.8	5
172	Hg-based alternatives to MCT. , 2001, , 377-400.		5
173	Heterostructure infrared photodiodes. Semiconductor Physics, Quantum Electronics and Optoelectronics, 2000, 3, 111-120.	1.0	5
174	Figure of merit for infrared detector materials. Infrared Physics and Technology, 2022, 122, 104063.	2.9	5
175	PbS $1-x$,Se x , ($O_{\frac{1}{2}x}C_{\frac{1}{2}1}$) photovoltaic detectors: carrier lifetimes and resistance-area product. Infrared Physics, 1983, 23, 23-32.	0.5	4
176	Band-to-band recombination in GaxIn $1-x$ Sb. Infrared Physics, 1987, 27, 353-360.	0.5	4
177	Auger-limited carrier lifetime in HgZnTe ambient temperature $10.6^{+1/4}m$ photoresistors. Infrared Physics, 1989, 29, 149-154.	0.5	4
178	<title>Two-dimensional analysis of double-layer heterojunction HgCdTe photodiodes</title>. , 2001, 4288, 335.		4
179	QUANTUM WELL INFRARED PHOTOCONDUCTORS IN INFRARED DETECTORS TECHNOLOGY. International Journal of High Speed Electronics and Systems, 2002, 12, 593-658.	0.7	4
180	Surface leakage current in HgCdTe photodiodes. , 2002, , .		4

#	ARTICLE	IF	CITATIONS
181	Minority carrier lifetime and noise in abrupt molecular-beam epitaxy-grown HgCdTe heterostructures. Journal of Electronic Materials, 2003, 32, 639-645.	2.2	4
182	Two-colour HgCdTe infrared detectors operating above 200 K. Opto-electronics Review, 2008, 16, .	2.4	4
183	Novel uncooled infrared detectors. Opto-electronics Review, 2010, 18, .	2.4	4
184	Performance limits of room-temperature InAsSb photodiodes. , 2010, , .		4
185	MWIR type-II InAs/GaSb superlattice interband cascade photodetectors. , 2013, , .		4
186	Low-frequency noise in type-II superlattice MWIR nBn detector. , 2013, , .		4
187	Theoretical modelling of MWIR thermoelectrically cooled nBn HgCdTe detector. Bulletin of the Polish Academy of Sciences: Technical Sciences, 2013, 61, 211-220.	0.8	4
188	Demonstration of Mid-Wave Type-II Superlattice InAs/GaSb Single Pixel Barrier Detector With GaAs Immersion Lens. IEEE Electron Device Letters, 2016, 37, 64-66.	3.9	4
189	Trap parameters in the infrared InAsSb absorber found by capacitance and noise measurements. Semiconductor Science and Technology, 2019, 34, 105017.	2.0	4
190	Response time study in unbiased long wavelength HgCdTe detectors. Optical Engineering, 2017, 56, 1.	1.0	4
191	Type-II superlattice photodetectors versus HgCdTe photodiodes. , 2019, , .		4
192	Performance Evaluation of Type-II Superlattice Devices Relative to HgCdTe Photodiodes. IEEE Transactions on Electron Devices, 2022, 69, 2992-3002.	3.0	4
193	heterojunctions prepared by a modified hot wall technique. Thin Solid Films, 1980, 67, 179-186.	1.8	3
194	PbTe photodiodes prepared by the hot-wall evaporation technique. Thin Solid Films, 1983, 103, 343-353.	1.8	3
195	On the Performance of Non-Cooled (In, As)Sb Photoelectromagnetic Detectors for 10.6 m Radiation. Physica Status Solidi A, 1985, 91, 745-751.	1.7	3
196	<title>Long-wavelength n+-on-p HgCdTe photodiodes: theoretical predictions and experimental data</title>., 1995, , .		3
197	<title>Liquid-phase epitaxial growth and characterization of In(Sb,Bi)</title>., 1999, , .		3
198	HgCdTe photodiode passivated with a wide-bandgap epitaxial layer. , 1999, 3629, 416.		3

#	ARTICLE	IF	CITATIONS
199	Competition of infrared detector technologies. , 2003,,.		3
200	HgCdTe infrared detectors: historical prospect. , 2003,,.		3
201	Morphology issues of HgCdTe samples grown by MOCVD. Proceedings of SPIE, 2009,,.	0.8	3
202	Enhanced numerical analysis of current-voltage characteristics of long wavelength infrared p-on-n HgCdTe photodiodes. Bulletin of the Polish Academy of Sciences: Technical Sciences, 2010, 58, .	0.8	3
203	MOCVD grown MWIR HgCdTe detectors for high operation temperature conditions. Opto-electronics Review, 2014, 22, .	2.4	3
204	Advances in Infrared Technology and Applications: introduction. Applied Optics, 2016, 55, ITA1.	2.1	3
205	The Numericalâ€“Experimental Enhanced Analysis of HOT MCT Barrier Infrared Detectors. Journal of Electronic Materials, 2017, 46, 5471-5478.	2.2	3
206	Advanced Infrared Technology and Applications: introduction. Applied Optics, 2018, 57, AITA1.	1.8	3
207	2D Materials in Infrared Detector Family. Proceedings (mdpi), 2019, 27, 33.	0.2	3
208	Progress in Quantum Dot Infrared Photodetectors. Lecture Notes in Nanoscale Science and Technology, 2021,, 1-74.	0.8	3
209	Photoelectromagnetic, magnetoconcentration, and Dember infrared detectors. , 1997,, , 506-525.		3
210	High-operating temperature InAsSb/AlSb heterostructure infrared detectors grown on GaAs substrates by molecular beam epitaxy. Optical Engineering, 2018, 57, 1.	1.0	3
211	InAs/GaSb type-II superlattices versus HgCdTe ternary alloys: future prospect. , 2017,,.		3
212	Comparison of performance limits of HOT HgCdTe photodiodes and colloidal quantum dot infrared detectors. , 2020,,.		3
213	Comparative Study of the Molecular Beam Epitaxial Growth of InAs/GaSb Superlattices on GaAs and GaSb Substrates. Acta Physica Polonica A, 2017, 132, 322-324.	0.5	3
214	p-Type Doping of GaSb by Beryllium Grown on GaAs (001) Substrate by Molecular Beam Epitaxy. Journal of Semiconductor Technology and Science, 2016, 16, 695-701.	0.4	3
215	Van der Waals two-color infrared detection. Light: Science and Applications, 2022, 11, 27.	16.6	3
216	<title>GaAs/AlGaAs quantum well infrared photoconductors versus HgCdTe photodiodes for long-wavelength infrared applications</title>., 1994,,.		2

#	ARTICLE	IF	CITATIONS
217	Thermoelectrically cooled arsenic diffused medium-wavelength infrared HgCdTe photodiodes. Optical Engineering, 1994, 33, 1434.	1.0	2
218	<title>Comparison of the performance of quantum well and conventional bulk infrared photodetectors</title>, , 1997, , .		2
219	<title>Influence of doping and geometry on GaN ultraviolet photodiode performance: numerical modeling</title>, , 1997, , .		2
220	InGaAs versus HgCdTe for short-wavelength infrared applications. , 1999, , .		2
221	High-sensitivity 8- to 14- μ m HgCdTe photodetectors operated at ambient temperature. , 2000, 3948, 94.		2
222	Dual-band infrared focal plane arrays. , 2000, 4340, 1.		2
223	LPE growth of Hg 1-x Cd x Te heterostructures using a novel tipping boat. , 2000, 3948, 382.		2
224	Model and clinical studies of a novel differential lung ventilation system for adults. Critical Care, 2006, 10, P30.	5.8	2
225	MOCVD grown HgCdTe p ⁺ -BnN ⁺ barrier detector for MWIR HOT operation. Proceedings of SPIE, 2015, , .	0.8	2
226	Recent progress in LWIR HOT photoconductors based on MOCVD grown (100) HgCdTe. Semiconductor Science and Technology, 2016, 31, 105004.	2.0	2
227	Uncooled middle wavelength infrared photoconductors based on (111) and (100) oriented HgCdTe. Optical Engineering, 2017, 56, 091602.	1.0	2
228	Fast Response Hot (111) HGCDE MWIR Detectors. Metrology and Measurement Systems, 2017, 24, 509-514.	1.4	2
229	Terahertz Detectors. , 2018, , 418-431.		2
230	Long term stability study of InAsSb mid-wave infrared HOT detectors passivated through two step passivation technique. , 2018, , .		2
231	Study of the Effectiveness of Anodic Films as Surface Passivation for InAsSb Mid-Wave Infrared HOT Detectors. Acta Physica Polonica A, 2018, 134, 981-985.	0.5	2
232	Computer modeling of carrier transport in PbSnSe photodiodes. Infrared Physics and Technology, 1994, 35, 837-845.	2.9	1
233	<title>Computer modeling of carrier transport in binary lead salt photodiodes</title>, , 1995, , .		1
234	<title>Infrared thermal detectors versus photon detectors: II. focal plane arrays</title>, , 1997, 3179, 224.		1

#	ARTICLE	IF	CITATIONS
235	Comparison of mercury cadmium telluride LPE layers growth from Te-rich solution on (111)Cd 0.9 5Zn 0.05 Te and (211)Cd 0.9 5Zn 0.05 Te., 1999, , .	1	
236	Heterostructure HgCdTe photovoltaic detectors. , 2001, 4355, 1.	1	
237	<title>HgCdTe buried multiple photodiodes fabricated by the liquid phase epitaxy</title>., 2001, , .	1	
238	InAs/GaInSb superlattices as a promising material system for third generation infrared detectors., 2005, 5834, 1.	1	
239	Variation of pKa in the N-Terminal Tyrosine Side Chain in Octapeptide Analogs of Tendamistat Influences α Amylase Inhibition. Protein and Peptide Letters, 2007, 14, 497-501.	0.9	1
240	Outlook on quantum dot infrared photodetectors. Optical Memory and Neural Networks (Information Optics), 2009, 18, 234-252.	1.0	1
241	Contribution of Series Resistance in Modelling of High-Temperature Type II Superlattice p-i-n Photodiodes. Advances in Optical Technologies, 2012, 2012, 1-5.	0.8	1
242	New trends in infrared and terahertz detectors. , 2014, , .	1	
243	nBn T2SLs InAs/GaSb/B-AlGaSb HOT detector for fast frequency response operation. , 2014, , .	1	
244	Performance comparison of barrier detectors and HgCdTe photodiodes. Proceedings of SPIE, 2014, , .	0.8	1
245	Theoretical modelling of mercury cadmium telluride midâ€“wave detector for high temperature operation. IET Optoelectronics, 2014, 8, 239-244.	3.3	1
246	GaAs/AlGaAs QWIPs vs HgCdTe Photodiodes for LWIR Applications. , 1994, , 87-96.	1	
247	QUANTUM WELL INFRARED PHOTOCONDUCTORS IN INFRARED DETECTORS TECHNOLOGY. Selected Topics in Electronics and Systems, 2003, , 1-66.	0.2	1
248	Advanced Infrared Technology and Applications. Advances in Optical Technologies, 2013, 2013, 1-2.	0.8	1
249	History of HgTe-based photodetectors in Poland. Opto-electronics Review, 0, , .	2.4	1
250	Influence of TDMAAs Acceptor Precursor on Performance Improvement of HgCdTe Photodiodes. Acta Physica Polonica A, 2010, 118, 1199-1204.	0.5	1
251	Structural and optical characterization of the high quality Be-doped InAs epitaxial layer grown on GaAs substrate. , 2018, , .	1	
252	Advanced Infrared Technology and Applications 2020: introduction to the feature issue. Applied Optics, 2020, 59, AIT1.	1.8	1

#	ARTICLE	IF	CITATIONS
253	2.22 Electrical and piezoresistive properties of Pb _{1-x} S _x Te thin films. Vacuum, 1977, 27, 317-319.	3.5	0
254	PbTe photodiodes prepared by the hot-wall evaporation technique. Thin Solid Films, 1983, 103, 343-353.	1.8	0
255	<title>Quantum-well infrared optoelectronic devices</title>., 1993, 1845, 61.		0
256	<title>Arsenic diffused p<formula>^{<roman>+</roman>}</formula>-n HgCdTe photodiodes</title>., 1993, 1845, 171.		0
257	<title>LWIR p+n photodiodes fabricated with HgCdTe bulk material</title>., 1995, 2373, 376.		0
258	<title>GaAs/AlGaAs quantum well infrared detectors among the other types of semiconductor infrared detectors</title>., 1995, ,.		0
259	Erratum to "Computer modelling of carrier transport in PbSnSe photodiodes". Infrared Physics and Technology, 1995, 36, 821.	2.9	0
260	<title>InAsSb heterojunction photodiodes grown by liquid phase epitaxy</title>., 1997, 3179, 247.		0
261	<title>RF magnetron sputtering deposition of CdTe passivation on HgCdTe</title>., 1998, ,.		0
262	<title>Comparison of GaN Schottky barrier and p-n junction photodiodes</title>., 1998, ,.		0
263	<title>Performance limitations of InGaAs photodiodes</title>., 1999, ,.		0
264	<title>Assessment of HgCdTe photodiodes and quantum well infrared photoconductors for long-wavelength focal plane arrays</title>., 1999, ,.		0
265	Computer modeling of dual-band HgCdTe photovoltaic detectors., 2000, ,.		0
266	Materials science and applications of solid crystals. III-Vs Review, 2001, 14, 46-50.	0.0	0
267	Chairman's Preface. Crystal Research and Technology, 2003, 38, 199-199.	1.3	0
268	<title>Quantum well infrared photoconductors in infrared detectors technology</title>., 2003, ,.		0
269	<title>Analysis of VLWIR HgCdTe photodiode performance</title>., 2003, ,.		0
270	Temperature dependent current-voltage characteristics of MWIR HgCdTe photodiodes operated at higher temperatures., 2005, 5957, 360.		0

#	ARTICLE	IF	CITATIONS
271	Unique differential lung ventilation system. Journal of Biomechanics, 2006, 39, S589.	2.1	0
272	HgTe-based photodetectors in Poland. Proceedings of SPIE, 2009, , .	0.8	0
273	History of HgTe-based photodetectors in Poland. Opto-electronics Review, 2010, 18, .	2.4	0
274	Changes in the boards of Opto-electronics review. Opto-electronics Review, 2013, 21, .	2.4	0
275	Absence of 1/f noise from diffusion and generation-recombination currents in p-i-n type-II superlattice MWIR detector., 2015, , .		0
276	Progress in MOCVD growth of HgCdTe epilayers for HOT infrared detectors. Proceedings of SPIE, 2016, , .	0.8	0
277	Theoretical utmost performance of the (1 0 0) long-wave HgCdTe Auger suppressed photodetectors grown on GaAs. Infrared Physics and Technology, 2017, 84, 58-62.	2.9	0
278	Uncertainty in the estimation of the $\text{InAs}_{1-x}\text{Sbx}$ intrinsic carrier concentration. Infrared Physics and Technology, 2021, 117, 103854.	2.9	0
279	<title>Characterization of p-on-n HgCdTe diffusion photodiodes</title>, 1995, , .		0
280	Influence of radiative recombination on performance of p-i-n HOT long wavelength infrared HgCdTe photodiodes., 2018, , .		0
281	High-operating temperatures InAsSb/AlSb heterostructure infrared detectors. , 2018, , .		0
282	Infrared Detector Characterization., 2020, , 15-34.		0
283	Fundamental Detector Performance Limits. , 2020, , 35-68.		0
284	Graphene-Based Detectors. , 2020, , 141-192.		0
285	Colloidal Quantum Dot Infrared Detectors. , 2020, , 217-232.		0
286	16th International Workshop on Advanced Infrared Technology and Applications (AITA 2021). Engineering Proceedings, 2022, 8, .	0.4	0
287	HgCdTe versus Other Material Systems: A Historical Look. , 0, , .		0
288	Erratum to "Performance Evaluation of Type-II Superlattice Devices Relative to HgCdTe Photodiodes" [Jun 22 2992-3002]. IEEE Transactions on Electron Devices, 2022, 69, 4050-4050.	3.0	0