Direct measurement of gap-state absorption in hydrogenated amorphous silicon by photothermal deflection spectroscopy

DOI: 10.1103/physrevb.25.5559
Physical Review B, 1982, 25, 5559-5562.

#	Paper	IF	Citations
564	Transport and recombination in hydrogenated amorphous silicon. **1984**, 133-161		3
563	Doping and the Fermi Energy in Amorphous Silicon. **1982**, 49, 1187-1190		455
562	Defects in Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1982**, 14, 75		
561	States in the gap of amorphous hydrogenated silicon. **1982**, 8, 269-276		6
560	The correlation energy of the dangling silicon bond in a ? Si:H. **1982**, 44, 477-480		96
559	The contribution of the staebler-wronski effect to gap-state absorption in hydrogenated amorphous silicon. **1983**, 117-118, 897-898		10
558	Low energy excitation of photoluminescence in a-Si:H : Temperature and intensity effects. **1983**, 45, 481-485		18
557	Study of gap states density in A-Si: H using thermally stimulated current in a space charge zone. **1983**, 48, 79-83		14
556	Comment on the optical absorption edge in a-Si:H. **1983**, 47, 985-987		38
555	Urbach edge and the density of states in hydrogenated amorphous silicon. **1983**, 47, 493-496		53
554	Optical absorption spectra of surface or interface states in hydrogenated amorphous silicon. *Applied Physics Letters*, **1983**, 42, 105-107	3.4	111
553	Electronic structure of amorphous semiconductors. **1983**, 32, 361-452		143
552	Effects of doping on transport and deep trapping in hydrogenated amorphous silicon. *Applied Physics Letters*, **1983**, 43, 672-674	3.4	215
551	Optical properties and correlation energy of defects in a-Ge:H. **1983**, 59-60, 249-251		17
550	Direct spectroscopic determination of the distribution of occupied gap states in a-Si:H. **1983**, 59-60, 253-256		49
549	Photoacoustic spectroscopy and charge transport of a-Si:H prepared by ion beam deposition. **1983**, 59-60, 289-292		6
548	Comparison of the density of gap states in a-Si:H found by different methods. **1983**, 59-60, 293-296		17

547	High-temperature kink of the conductivity of doped a-Si:H films. **1983**, 59-60, 301-304		9
546	The absolute luminescence quantum efficiency in hydrogenated amorphous silicon. **1983**, 59-60, 353-356		27
545	Photo-induced transient localized states in a-Si:H. **1983**, 59-60, 393-396		16
544	Study of light-induced creation of defects in a-Si:H by means of single and dual-beam photoconductivity. **1983**, 59-60, 397-400		134
543	The effects of compensation of light-induced metastable defects in a-Si:H. **1983**, 59-60, 409-412		12
542	Time-of-flight photoconductivity in a-Si:H. **1983**, 59-60, 449-452		16
541	Photoelectrical and optical study of p-type a-Si:H used as a photoreceptor. **1983**, 59-60, 493-496		15
540	Gap states in a-Si:H by photoconductivity and absorption. **1983**, 55, 191-201		27
539	Dopant states in a-Si: H. III. Triply coordinated boron. *Physical Review B*, **1983**, 28, 4666-4670	3.3	19
538	Temperature dependence of the photoconductive absorption edge in amorphous silicon. *Physical Review B*, **1983**, 28, 7075-7079	3.3	12
537	Role of dangling-bond defects in early recombination in hydrogenated amorphous silicon. *Physical Review B*, **1983**, 27, 2598-2601	3.3	36
536	Energy dependence of the carrier mobility-lifetime product in hydrogenated amorphous silicon. *Physical Review B*, **1983**, 27, 4861-4871	3.3	46
535	Density of gap states of silicon grain boundaries determined by optical absorption. *Applied Physics Letters*, **1983**, 43, 195-197	3.4	195
534	Recombination processes in a-Si: H. A study by optically detected magnetic resonance. *Physical Review B*, **1983**, 28, 6192-6208	3.3	54
533	Dopant states in a-Si: H. I. Tight-binding-model results. *Physical Review B*, **1983**, 28, 4647-4657	3.3	30
532	Mechanism for photogeneration of charge carriers in polyacetylene. *Physical Review B*, **1984**, 30, 786-794	3.3	149
531	Photoacoustic and xerographic investigation of the gap-state structure of a-Se: Comparison with a-Si:H. *Physical Review B*, **1984**, 29, 2353-2355	3.3	12
530	Recombination in a-Si: H: Transitions through defect states. *Physical Review B*, **1984**, 30, 5861-5870	3.3	98

529	Localized density of states in amorphous silicon determined by electrophotography. *Applied Physics Letters*, **1984**, 45, 438-439	3.4	8
528	Localized states in compensated a-Si:H. *Physical Review B*, **1984**, 29, 2331-2333	3.3	59
527	Photoinduced absorption spectra in a-Ge: H and a-Si: H. *Physical Review B*, **1984**, 30, 1083-1086	3.3	16
526	Chapter 3 Optical Properties of Defect States in a-Si: H. **1984**, 83-112		57
525	Chapter 11 Schottky Barriers on a-Si: H. **1984**, 21, 375-406		2
524	Chapter 8 Doping Effects in a-Si: H. **1984**, 257-307		25
523	Chapter 8 Photoconductivity. **1984**, 245-297		25
522	Majority and minority carrier lifetimes in doped a-Si junctions and the energy of the dangling-bond state. **1984**, 50, L33-L40		67
521	Chapter 7 Homogeneous Chemical Vapor Deposition. **1984**, 21, 123-149		8
520	Recent developments in ESR techniques and results for semiconductor surface regions. **1984**, 15, 85-120		8
519	A DLTS study of the effects of boron counterdoping on the gap states in n-type hydrogenated amorphous silicon. **1984**, 50, 991-994		3
518	Utilisation de la deflection photothermique pour l'etude de l'effet du chlore sur l'absorption par les etats de la bande interdite dans a-SiHCl. **1984**, 19, 961-968		3
517	Gap states density in a-Si:H deduced from subgap optical absorption measurement on Schottky solar cells. **1984**, 83, 617-623		54
516	Charge transient and optical absorption measurements of characteristic gap states in phosphorus doped a-Si:H. **1984**, 68, 147-152		12
515	Doping effects in amorphous silicon. **1984**, 66, 1-12		19
514	Material properties of glow-discharge a-SiSn:H alloys. **1984**, 66, 13-18		19
513	Effects of light soaking at different temperatures on the properties of hydrogenated amorphous silicon alloys. **1984**, 66, 65-70		8
512	Chapter 2 The Optical Absorption Edge of a-Si: H. **1984**, 11-82		125

511	Photoemission and optical properties. *Topics in Applied Physics*, **1984**, 61-168	0.5	67
510	Photothermal Beam Deflection Study of Titanium Metal Corrosion by a Hot Lubricant. **1984**, 38, 804-807		9
509	In-gap optical absorption of amorphous Si3N4. *Applied Physics Letters*, **1984**, 45, 1060-1062	3.4	12
508	Chapter 12 Photoelectron Emission Studies. **1984**, 385-426		1
507	Measurements of the electron density in n-type a-Si: H. **1984**, 50, L19-L22		49
506	Chapter 7 Luminescence in a-Si: H. **1984**, 21, 197-244		27
505	An Assessment of a-SiGe:H Alloys with a Band Gap of 1.5eV as to their Suitability for Solar Cell Applications. *Materials Research Society Symposia Proceedings*, **1985**, 49, 167		9
504	Gap States in Hydrogenated Amorphous Silicon-Carbon Alloys. *Materials Research Society Symposia Proceedings*, **1985**, 49, 195		5
503	Tunneling Contributions to NiP and Pin Hydrogenated Amorphous Silicon Devices. *Materials Research Society Symposia Proceedings*, **1985**, 49, 287		9
502	Recombination under Double Injection Conditions in a-Si:H Based Diodes. *Materials Research Society Symposia Proceedings*, **1985**, 49, 89		
501	Below-gap primary photocurrent associated with correlated defects in hydrogenated amorphous silicon. **1985**, 52, 1115-1133		28
500	Urbach tail and gap states in hydrogenated a-SiC and a-SiGe alloys. **1985**, 54, 597-601		113
499	Interface density of neutral dangling bonds in a-Si:H/a-SiNx:H superlattices. **1985**, 55, 105-107		24
498	Determination of low absorption coefficients from absorptance measurements on thin films. **1985**, 55, 169-173		27
497	Disorder and defects in sputtered a-SiH from subgap absorption measurements. **1985**, 55, 435-438		36
496	Charge carrier dynamics in a-Si:H. **1985**, 54, 119-121		7
495	Influence of doping on the optical properties and on the covalent bonds in plasma deposited amorphous silicon. **1985**, 12, 221-232		15
494	Disorder and density of defects in hydrogenated amorphous silicon-carbon. **1985**, 54, 107-110		35

493	Evaluation of Si Thin Films by Photothermal Deflection Spectroscopy (PDS). **1985**, 24, 1463-1466		9
492	The exponential absorption edge and the low absorption range shoulder of a-Si:H. **1985**, 2, 137-140		
491	Transient mobility and lifetime studies in amorphous silicon and their interpretation. **1985**, 52, 247-260		21
490	Dopant and defect states in a-Si:H. **1985**, 52, 235-245		46
489	Optical absorption and photoluminescence of glow-discharge amorphous Si:F films. *Physical Review B*, **1985**, 31, 6609-6615	3.3	10
488	A study of hydrogenated amorphous silicon deposited by hot-wall glow discharge. *Journal of Applied Physics*, **1985**, 58, 3494-3498	2.5	16
487	Effects of dopants and defects on light-induced metastable states in a-Si:H. *Physical Review B*, **1985** , 31, 2263-2269	3.3	79
486	Identification of deep-gap states in a-Si:H by photo- depopulation-induced electron-spin resonance. *Physical Review B*, **1985**, 31, 4066-4069	3.3	41
485	Dangling bonds and the Urbach tail in silicon. *Journal of Applied Physics*, **1985**, 58, 2704-2708	2.5	13
484	Transient conductivity and photoconductivity in a-Si:H. *Physical Review B*, **1985**, 32, 3910-3920	3.3	22
483	Doping mechanism in a-Si:H. *Physical Review B*, **1985**, 31, 3817-3821	3.3	31
482	Luminescence line shape of amorphous hydrogenated carbon and silicon. *Physical Review B*, **1985**, 32, 1317-1318	3.3	11
481	Influence of dangling-bond defects on recombination in a-Si:H. *Physical Review B*, **1985**, 31, 6913-6916	3.3	16
480	Optical modulation spectroscopy of amorphous semiconductors. **1985**, 52, 313-324		30
479	Dangling Bonds and Sub-Gap Optical Absorption in Silicon. *Materials Research Society Symposia Proceedings*, **1985**, 46, 539		1
478	Analysis of light and current induced effects in hydrogenated amorphous silicon. *Applied Physics Letters*, **1985**, 47, 860-862	3.4	18
477	Structural, electrical, and optical properties of a-Si1-xGex:H and an inferred electronic band structure. *Physical Review B*, **1985**, 31, 2198-2212	3.3	241
476	Optical absorption and dangling bonds in damaged silicon. *Journal of Applied Physics*, **1985**, 58, 2709-2712	2.5	6

475	Localized states in doped amorphous silicon. **1985**, 77-78, 1-16		149
474	Density-of-states distribution in the mobility gap of a-Si:H. **1985**, 77-78, 273-280		42
473	Implications of recent density-of-states measurements for optical and transport properties of a-Si:H. **1985**, 77-78, 281-290		26
472	Correlation of optical and thermal emission from mobility GAP states in doped hydrogenated amorphous silicon. **1985**, 77-78, 291-294		8
471	On the interpretation of sub-bandgap optical absorption in a?-Si:H. **1985**, 77-78, 295-298		9
470	Gap-state absorption in hydrogenated and chlorinated amorphous silicon films by photothermal deflection spectroscopy. **1985**, 77-78, 307-310		5
469	Energy placement of the D□dangling-bond transition in a-Si:H from photocapacitance and photocurrent spectroscopies. **1985**, 77-78, 335-338		8
468	Electrophotographic spectroscopy of gap states in hydrogenated amorphous silicon. **1985**, 77-78, 359-362		5
467	Light induced change in a-Si:H material and P-I-N devices. **1985**, 77-78, 409-412		3
466	Analysis of light and current induced effects on □product and localized electronic states in a-Si:H. **1985**, 77-78, 413-416		
465	The temperature dependence of the D° and D+ capture cross-section in a-Si. **1985**, 77-78, 607-610		19
464	Influence of dangling bond defects on recombination in a-Si:H. **1985**, 77-78, 651-654		1
463	The enhancement of the photoconductivity of a-SiSn (Cl:H) alloys by means of G D technique. **1985**, 77-78, 905-908		2
462	Spectroscopic characterization of material and junction in amorphous silicon solar cells. **1985**, 77-78, 1441-1449		9
461	Optical properties of semiconducting iron disilicide thin films. *Journal of Applied Physics*, **1985**, 58, 2696-2703	2.5	481
460	Recombination at dangling bonds and steady-state photoconductivity in a-Si:H. *Physical Review B*, **1986**, 34, 4088-4098	3.3	88
459	The Physical Properties of Hydrogenated Amorphous Silicon. **1986**, T13, 45-52		3
458	Direct electron spin resonance determination of dangling bond energies in rf sputtered hydrogenated amorphous silicon. *Applied Physics Letters*, **1986**, 49, 1438-1440	3.4	7

457	Time-of-flight measurement of hole transport in lightly boron-doped a-Si:H films. **1986**, 88, 171-181		2
456	DOPANT AND DEFECT STATES IN AMORPHOUS SILICON. **1986**, 278-288		
455	Spatially-Resolved Non-Contact Methods for the Investigation of Transport and Defects in Semiconductors. *Materials Research Society Symposia Proceedings*, **1986**, 69, 51		
454	Dopant Incorporation and Doping Efficiency in a-Si:H and a-Ge:H. *Materials Research Society Symposia Proceedings*, **1986**, 70, 203		7
453	Measurements of Light-Induced Degradation in A-Si,Ge:H,F Alloys. *Materials Research Society Symposia Proceedings*, **1986**, 70, 237		5
452	The Characterization of Silicon Damaged by Low Energy Argon Ion Etching. *Materials Research Society Symposia Proceedings*, **1986**, 76, 171		1
451	Electronic Transport and the Density of States Distribution in a-(Si,Ge):H,F Alloys. *Materials Research Society Symposia Proceedings*, **1986**, 70, 269		20
450	Carrier scattering at periodic a-Si:H,F barriers in a-Si,Ge:H,F alloys. **1986**, 2, 391-396		3
449	The doping efficiency in amorphous silicon and germanium. **1986**, 53, L15-L21		34
448	Subgap Absorption of Boron-Doped and Undoped a-SiC:H Detected by Photothermal Deflection Spectroscopy. **1986**, 25, L388-L390		9
447	Origin of the non-exponential photocurrent decay in amorphous semiconductors. **1986**, 54, 285-299		19
446	rf-sputtered B-doped a-Si:H and a-Si-B-H alloys. *Physical Review B*, **1986**, 34, 7031-7044	3.3	14
445	Photocarrier dynamics in compensated hydrogenated amorphous silicon. *Physical Review B*, **1986**, 33, 4396-4398	3.3	9
444	The localized density of states in amorphous silicon determined by electrophotography. *Journal of Applied Physics*, **1986**, 60, 3176-3181	2.5	8
443	Schottky barriers on phosphorus-doped hydrogenated amorphous silicon: The effects of tunneling. *Physical Review B*, **1986**, 33, 6936-6945	3.3	35
442	Thermal-equilibrium defect processes in hydrogenated amorphous silicon. **1986**, 57, 2450-2453		143
441	Photoconductivity and light-induced change in a-Si:H. *Physical Review B*, **1986**, 34, 2475-2481	3.3	43
440	Systematic investigation of picosecond photoinduced absorption in hydrogenated amorphous silicon. *Physical Review B*, **1986**, 34, 3023-3026	3.3	26

439	Determination of the recombination rate constants in amorphous silicon from double-injection experiments. **1986**, 53, 463-475		21
438	Energy levels of dangling-bond centres in a-Si:H studied by photocapadtance transient spectroscopy. **1987**, 55, 135-141		11
437	Influence of Plasma Excitation Frequency on Deposition Rate and on Film Properties for Hydrogenated Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1987**, 95, 249		17
436	Optical absorption edge of hydrogenated amorphous silicon studied by photoacoustic spectroscopy. **1987**, 56, 79-97		88
435	Photoinduced Absorption on Phosphorus and Nitrogen Doped a-Si:H Films Prepared at High Deposition-Rate. **1987**, 26, 655-659		
434	Influence of microstructure on the Urbach edge of amorphous SiC:H and amorphous SiGe:H alloys. *Applied Physics Letters*, **1987**, 51, 1167-1169	3.4	64
433	Amorphous (SiC)xGe1⊠ :H films prepared by rf sputtering: Optical and electrical properties. *Journal of Applied Physics*, **1987**, 62, 3353-3359	2.5	3
432	Photothermal and photoconductive determination of surface and bulk defect densities in amorphous silicon films. *Applied Physics Letters*, **1987**, 50, 1521-1523	3.4	159
431	Thermal-equilibrium processes in amorphous silicon. *Physical Review B*, **1987**, 35, 1316-1333	3.3	309
430	Detailed investigation of doping in hydrogenated amorphous silicon and germanium. *Physical Review B*, **1987**, 35, 5666-5701	3.3	254
429	Band tails, entropy, and equilibrium defects in hydrogenated amorphous silicon. **1987**, 59, 688-691		173
428	Anomalous substrate and annealing temperature dependencies of heavily boron-doped hydrogenated amorphous silicon. *Journal of Applied Physics*, **1987**, 61, 2092-2095	2.5	11
427	Effect of Low Level Doping of Boron and Phosphorus on the Properties of Amorphous Silicon Films. *Materials Research Society Symposia Proceedings*, **1987**, 95, 137		
426	Interface Passivation in Amorphous Silicon TFTs by Various Gate Dielectric Materials. *Materials Research Society Symposia Proceedings*, **1987**, 95, 451		2
425	Stability in Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1987**, 95, 551		4
424	Thermalization and radiative recombination of photo-excited carriers in a-Si: H. **1987**, 56, 457-470		8
423	The density of states in undoped and doped amorphous hydrogenated silicon. **1987**, 90, 91-98		56
422	Study of trapped non-equilibrium carriers in a-Si:H by a two-beam experiment. **1987**, 90, 147-150		1

421	Surface states and the exponential valence-band tail in a-Si:H. *Physical Review B*, **1987**, 36, 6072-6078	3.3	69
420	Investigation of surface passivation of amorphous silicon using photothermal deflection spectroscopy. *Applied Physics Letters*, **1987**, 50, 101-103	3.4	34
419	Problems in the understanding of electronic properties of amorphous silicon. **1987**, 97-98, 1-14		66
418	Transport in the electron tail states of amorphous silicon. **1987**, 97-98, 15-22		21
417	Surface states and the intrinsic valence band tail in a-Si:H. **1987**, 97-98, 703-706		3
416	Study of surface/interface and bulk defect density in a-Si:H by means of photothermal deflection spectroscopy and photoconductivity. **1987**, 97-98, 731-734		44
415	The density of gap states in single- and multi-layer of a-Si:H measured by optical absorption and infrared stimulated current. **1987**, 97-98, 751-754		3
414	Measurement of surface photovoltage in high-rate deposited a-Si:H films and comparison with photothermal deflection spectroscopy and conductivity data. **1987**, 97-98, 759-762		1
413	Equilibrium between band tails and dangling bonds in a-Si:H. **1987**, 97-98, 775-778		10
412	On the constant photoconductivity method in amorphous semiconductors. **1987**, 20, L341-L345		1
411	Glow-discharge amorphous silicon: Growth process and structure. **1987**, 2, 139-184		161
410	Dynamics of Staebler-Wronski effect in hydrogenated amorphous silicon. **1987**, 97-98, 787-790		7
409	Absorption in amorphous silicon doping-modulated multilayers. **1987**, 97-98, 927-930		2
408	a - Si1⌧Gex: H alloys for solar cells. **1987**, 97-98, 1075-1078		7
407	Physics of Amorphous Silicon▯Carbon Alloys. *Physica Status Solidi (B): Basic Research*, **1987**, 143, 345-418	1.3	417
406	Influence of plasma excitation frequency fora-Si:H thin film deposition. **1987**, 7, 267-273		154
405	Evidence for microstructure in glow discharge hydrogenated amorphous Si-C alloys. **1987**, 21, 117-126		75
404	Metastability of hydrogenated amorphous silicon. **1987**, 21, 419-429		

403	Some new results on the electronic properties of a-Si and a-SiNx. **1988**, 163, 85-95		
402	Hydrogen content, transport properties and light degradation of a-Si:H films containing artificially generated interfaces. **1988**, 17, 1-16		6
401	Identification of electron and hole picosecond trapping processes in doped a-Si:H. **1988**, 65, 601-604		5
400	Thermalization of photoexcited carriers in a-Si:H. **1988**, 40-41, 559-560		3
399	Optical spectroscopy of hydrogenated amorphous silicon. **1988**, 24, 299-305		3
398	Optical investigation of a-Si:H/a-SiNx:H superlattices. *Physical Review B*, **1988**, 37, 8837-8841	3.3	16
397	Study of localized states in amorphous chalcogenide Sb2S3 films. **1988**, 101, 151-155		15
396	Optical and electronic properties of an amorphous silicon-germanium alloy with a 1.28 eV optical gap. *Applied Physics Letters*, **1988**, 52, 477-479	3.4	9
395	.		
394	. **1988**,		1
393	. **1988**,		2
392	Evidence for the intrinsic nature of light-induced defects in undoped a-Si:H. *Physical Review B*, **1988**, 37, 8465-8467	3.3	9
391	Distribution of occupied near-surface band-gap states in a-Si:H. *Physical Review B*, **1988**, 38, 7680-7693	3.3	75
390	Exponential conduction-band tail in P-doped a-Si:H. **1988**, 60, 2697-2700		41
389	Microstructure and the light-induced metastability in hydrogenated amorphous silicon. *Applied Physics Letters*, **1988**, 52, 1587-1589	3.4	167
388	The annealing behavior of light-induced defects in a-Si:H. *Journal of Applied Physics*, **1988**, 64, 713-717	2.5	18
387	Reduced photoinduced degradation in chemical vapor deposited hydrogenated amorphous silicon films. *Applied Physics Letters*, **1988**, 52, 807-809	3.4	8
386	. **1988**,		

385	Optical absorption and defects in amorphous SiNx and SiOx. **1988**, 57, 431-440		45
384	Planar and transverse electrical conductivity of doped a-Si:H. *Semiconductor Science and Technology* , **1988**, 3, 1037-1040	1.8	
383	The evaluation of some disorder parameters of RF glow discharge hydrogenated amorphous carbon films a-C:H. **1988**, 21, 995-998		13
382	Charge-induced structural relaxation in hydrogenated amorphous silicon. **1988**, 1-20		3
381	Photoquenching of Defect Related Luminescence in Amorphous Si:H. *Materials Research Society Symposia Proceedings*, **1988**, 118, 135		
380	Changes in the Density of States in a-Si:H with the Generation and Annealing of Light-Induced Defects. *Materials Research Society Symposia Proceedings*, **1988**, 118, 147		
379	Structural and Electronic Disorder in Boron, Nitrogen and Phosphorus Doped 50kHz PECVD a-Si:H. *Materials Research Society Symposia Proceedings*, **1988**, 118, 123		6
378	Comparison of Light-Induced Degradation in Low and High-Rate Deposited VHF-GD a-Si:H: Effect of Film Inhomogeneities. *Materials Research Society Symposia Proceedings*, **1988**, 118, 159		3
377	Metastable Optical Absorption and Paramagnetism in Hydrogenated Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1988**, 118, 309		
376	The Optoelectronic Properties of a-Si, Ge:H(F) Alloys). *Materials Research Society Symposia Proceedings*, **1988**, 118, 623		16
375	Transient photocurrent study of the dangling bond centre in undoped amorphous silicon. **1988**, 57, 13-29		7
374	Gap states in undoped amorphous silicon studied by below-gap modulated photocurrent spectroscopy. **1988**, 58, 171-184		19
373	Amorphous Silicon Solar Cells. **1989**, 1-98		8
372	Characterization of microvoids in device-quality hydrogenated amorphous silicon by small-angle x-ray scattering and infrared measurements. *Physical Review B*, **1989**, 40, 12024-12027	3.3	77
371	Photopyroelectric spectroscopy of a-Si:H thin semiconducting films on quartz. *Physical Review B*, **1989**, 39, 5254-5260	3.3	35
370	Critical comparison of light-induced changes in sub-band-gap absorption and photoconductivity in hydrogenated amorphous silicon. *Applied Physics Letters*, **1989**, 54, 1247-1249	3.4	10
369	Preparation of highly photoconductive hydrogenated amorphous silicon carbide films with a multiplasma-zone apparatus. *Journal of Applied Physics*, **1989**, 65, 2439-2444	2.5	20
368	Chemical-equilibrium model of impurity incorporation in n-type a-Si:H. **1989**, 63, 880-883		13

367	Dangling bonds in doped amorphous silicon: Equilibrium, relaxation, and transition energies. *Physical Review B*, **1989**, 39, 5107-5115	3.3	47
366	Solid-source doping of hydrogenated amorphous silicon. **1989**, 60, 177-182		4
365	The effect of the substrate on photothermal deflection spectroscopy measurements of optical absorption in a-Si:H. **1989**, 59, 149-153		9
364	Re-Examination of Carrier Trapping Models for Light-Induced Changes in Hydrogenated Amorphous Silicon. **1989**, 28, L1089-L1091		2
363	High-Quality p-Type a-SiC Films Obtained by Using a New Doping Gas of B(CH3)3. **1989**, 28, 2436-2440		22
362	Optical Studies of Doping-Characteristics in Boron-Doped a-Si:H Films Prepared by the Photo-CVD Technique. **1989**, 28, 961-964		3
361	. **1989**, 36, 2848-2852		5
360	. **1989**, 36, 2853-2858		2
359	Small-angle X-ray scattering studies of microvoids in a-SiC:H and a-Si:H. **1989**, 27, 465-476		57
358	Optical properties of a-Si: B films. **1989**, 6, 537-540		
357	Structural, optical, and spin properties of hydrogenated amorphous silicon-germanium alloys. *Journal of Applied Physics*, **1989**, 66, 569-592	2.5	137
356	Threshold voltage instability of a-Si:H TFTs in liquid crystal displays. **1989**, 115, 138-140		27
355	Defects in a-Si:H films produced by remote plasma enhanced chemical vapor deposition. **1989**, 107, 295-300		3
354	Light scattering effects in CPM and PDS measurement on a-Si:H films. **1989**, 114, 405-407		13
353	Photomodulation spectroscopy of defects in hydrogenated amorphous silicon germanium alloys. **1989**, 114, 585-587		6
352	Study of artificial interfaces in undoped and phosphorus doped a-Si:H. **1989**, 114, 684-686		2
351	In vivo measurement of spectroscopic and photochemical properties of intact leaves using the mirage effect **1989**, 250, 395-399		15
350	Spin Relaxation Spectroscopy of the D-Center in Hydrogenated Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1989**, 149, 113		

349	VHF-GD a-Si:H Films Prepared at Very Low Temperature. *Materials Research Society Symposia Proceedings*, **1989**, 149, 81		7
348	The transport properties of hydrogenated amorphous semiconductors. **1989**, 138-150		2
347	Sweep-out measurements of band-tail carriers in a-Si: H. **1989**, 60, 213-236		34
346	Optical Absorption in Amorphous Semiconductors. **1989**, T29, 157-161		5
345	Electron and hole transport in compensated amorphous silicon. **1990**, 62, 509-525		8
344	A Cluster Calculation of B and P Impurities in Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1990**, 209, 183		2
343	Density of States of Amorphous Germanium Thin Films Deposited by the Pecvd of H2-Diluted Germane. *Materials Research Society Symposia Proceedings*, **1990**, 192, 163		5
342	Photothermal Investigation of Surfaces and Interfaces in Amorphous Silicon Films. *Materials Research Society Symposia Proceedings*, **1990**, 192, 207		2
341	Annealing of Defects During the Deposition of Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1990**, 192, 615		1
340	Annealing of intrinsic and photo-induced defects in hydrogenated amorphous silicon. **1990**, 193-194, 577-587		1
339	Photothermal and Photoconductive Measurements of Low Pressure Chemically Vapour Deposited Amorphous Silicon. **1990**, 119, 169-176		7
338	Photothermal beam deflection: a new method for in vivo measurements of thermal energy dissipation and photochemical energy conversion in intact leaves. **1990**, 24, 63-73		13
337	Photothermal detection of surface states in amorphous silicon films. **1990**, 50, 503-507		25
336	Electron spin resonance and photoacoustic spectroscopy of a-CSi:H and a-SiGe:H alloys. **1990**, 190, 351-358		4
335	Deconvolution of CPM absorption spectra: A new technique. **1990**, 76, 1301-1303		28
334	Improvement of plasma-deposited a?Ge : H thin films by hydrogen dilution of germane. **1990**, 74, 721-725		13
333	Limitations of the integrated sub-band-gap absorption for determining the density of defects in amorphous silicon. *Journal of Applied Physics*, **1990**, 67, 578-580	2.5	10
332	Impurity incorporation and doping efficiency in a-Si:H. *Physical Review B*, **1990**, 42, 3120-3128	3.3	18

331	Gap density of states in amorphous silicon-germanium alloy: Influence on photothermal deflection spectroscopy and steady-state conductivity measurements. *Journal of Applied Physics*, **1990**, 67, 814-825	2.5	33
330	Deposition-induced defect profiles in amorphous hydrogenated silicon. *Applied Physics Letters*, **1990**, 56, 2448-2450	3.4	26
329	Defect creation by 10-keV electron irradiation in phosphorous-doped a-Si:H. *Journal of Applied Physics*, **1990**, 67, 2800-2805	2.5	5
328	. **1990**, 2, 499-501		32
327	Elimination of interference fringes from thin film photothermal spectra. **1990**, 9, 173-176		4
326	Electronic properties of semiconducting FeSi2 films. *Journal of Applied Physics*, **1990**, 68, 1726-1734	2.5	240
325	The investigation of charge transport in compensated amorphous silicon. **1990**, 16, 389-402		1
324	Photo-induced metastability in amorphous semiconductors. **1991**, 137-138, 1-10		43
323	The correlation between hydrogen content and electronic properties in a-Si:H. **1991**, 137-138, 57-60		16
322	Nature of deep defects in bulk VHF-GD a-Si:H. **1991**, 137-138, 335-338		11
321	How to reach more precise interpretation of subgap absorption spectra in terms of deep defect density in a-Si:H. **1991**, 137-138, 347-350		148
320	Defects and disorder broadened band tails in compensated hydrogenated amorphous silicon. **1991**, 137-138, 387-390		9
319	The role of nitrogen in sputtered a-Si:H, a-Ge:H and a-Si56Ge44:N:H. **1991**, 137-138, 821-824		9
318	Densities of states below midgap determined from the space-charge-limited currents of holes in intrinsic hydrogenated amorphous silicon. *Applied Physics Letters*, **1991**, 58, 272-274	3.4	4
317	Hard amorphous (diamond-like) carbons. **1991**, 21, 199-333		703
316	Evidence for potential fluctuations in compensated amorphous silicon. *Physical Review B*, **1991**, 44, 7935-7940	3.3	66
315	On the mechanism of doping and defect formation in a-Si: H. **1991**, 63, 123-141		111
314	Doping dependence of the low-temperature photoconductivity in hydrogenated amorphous silicon. **1991**, 63, 101-108		7

313	Sub-Bandgap Optical Absorption in Amorphous Silicon using Photo-Pyroelectric Spectroscopy. *Materials Research Society Symposia Proceedings*, **1991**, 219, 545		4
312	Defect States in Hydrogenated Amorphous Silicon-Sulphur Alloys by ESR and PAS. *Materials Research Society Symposia Proceedings*, **1991**, 219, 593		
311	The Distribution of Occupied Deep Levels in a-Si:H Determined from CPM Spectra. *Materials Research Society Symposia Proceedings*, **1991**, 219, 611		8
310	Tail states in hydrogenated amorphous silicon studied by thermoluminescence. **1991**, 80, 563-566		3
309	Effective nitrogen doping of a-Ge: H films prepared by DC-magnetron sputtering. **1991**, 79, 799-801		9
308	Surface and bulk density of states analysis in a-Si:H by a new interpretation of PDS and CPM measurements. **1991**, 77, 177-180		9
307	Effects of deposition temperature on properties of r.f. glow discharge amorphous silicon thin films. **1991**, 205, 140-145		7
306	Radiation resistance of thin-film solar cells for space photovoltaic power. **1991**, 31, 297-329		45
305	Hydrogen related effects in a-Si:H studied by photothermal deflection spectroscopy. **1991**, 170, 269-272		6
304	pi bands and gap states from optical absorption and electron-spin-resonance studies on amorphous carbon and amorphous hydrogenated carbon films. *Physical Review B*, **1991**, 43, 2131-2135	3.3	191
303	Photothermal deflection spectroscopy study of defects in semi-insulating GaAs. **1991**, 52, 112-114		10
302	Comments on the Determination of Defect Density in a-Si:H Alloys by Integrating the Sub-Bandgap Optical Absorption Coefficient. *Materials Research Society Symposia Proceedings*, **1991**, 219, 587		6
301	A Comparative Study of the Electronic Stability of Hydrogenated Amorphous Silicon and Silicon-Germanium Alloy Material. **1991**, 30, 228-232		7
300	Depth profiling of nonuniform optical absorption in thin films: Application to hydrogenated amorphous silicon. *Journal of Applied Physics*, **1991**, 70, 5025-5034	2.5	31
299	Optoelectronic properties of hydrogenated amorphous silicon films deposited under negative substrate bias. *Journal of Applied Physics*, **1991**, 69, 2942-2950	2.5	44
298	Measurement of vibrational deexcitation efficiencies of gold, chromium, zinc selenide, and amorphous carbon thin films. *Physical Review B*, **1991**, 44, 11649-11654	3.3	6
297	Band tails and deep-defect density of states in hydrogenated amorphous germanium. *Physical Review B*, **1991**, 44, 5506-5509	3.3	10
296	Irreversible changes in doping efficiency and hydrogen bonding in the equilibrium state of a-Si:H. *Physical Review B*, **1991**, 43, 4820-4826	3.3	15

295	Ion dose effect in subgap absorption spectra of defects in ion implanted GaAs and Si. *Journal of Applied Physics*, **1991**, 70, 7060-7064	2.5	29
294	Persistent photoconductance in doping-modulated and compensated a-Si:H. *Physical Review B*, **1991**, 44, 5585-5602	3.3	18
293	Effect of Ion Doping Conditions on Electrical Conductivity of Amorphous Silicon Films and Its Application to Thin Film Transistors. **1992**, 31, 4563-4566		5
292	Transport properties of nitrogen-doped hydrogenated amorphous germanium films. *Physical Review B*, **1992**, 46, 2119-2125	3.3	28
291	Observation of a novel relaxation process associated with electronic transitions from deep (D) defects in hydrogenated amorphous silicon. **1992**, 69, 3358-3361		69
290	Near-ir absorption in chemically vapor deposited a-SiNx:H films. *Physical Review B*, **1992**, 46, 15163-15168	3.3	7
289	A comprehensive defect model for amorphous silicon. *Journal of Applied Physics*, **1992**, 72, 2857-2872	2.5	53
288	Differences in physical properties of hydrogenated and fluorinated amorphous silicon carbide prepared by reactive sputtering. *Journal of Applied Physics*, **1992**, 71, 5641-5645	2.5	20
287	Charged dangling bonds in undoped amorphous silicon. *Applied Physics Letters*, **1992**, 60, 3262-3264	3.4	22
286	Improvement of sensitivity of photothermal deflection spectroscopy by a double pass method. **1992**, 63, 1909-1913		3
285	VHF Plasma Deposition: A Comparative Overview. *Materials Research Society Symposia Proceedings*, **1992**, 258, 15		40
284	Persistent photoconductance in a-Si: H/a-SiOx:H multilayers. **1992**, 65, 79-98		6
283	Toward the Elimination of Light-Induced Degradation of Amorphous Si by Fluorine Incorporation. *Materials Research Society Symposia Proceedings*, **1992**, 258, 491		2
282	High-Bandgap a-SI:H Deposited by Concentric-Electrode rf Glow Discharge. *Materials Research Society Symposia Proceedings*, **1992**, 258, 63		
281	The Spectral Dependence of the Non-Radiative Efficiency in Hydrogenated Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1992**, 258, 789		
280	□-bonded clusters in amorphous carbon materials. **1992**, 66, 199-209		76
279	Equilibrium density of defects in hydrogenated amorphous silicon carbon alloys. *Journal of Applied Physics*, **1992**, 71, 5969-5975	2.5	4
278	Amorphous clusters I. Electronic structure of Si clusters with N, P and As dopants. **1992**, 143, 232-240		12

277	Influence of hydrogen dilution on the optoelectronic properties of glow discharge amorphous silicon carbon alloys. *Journal of Applied Physics*, **1992**, 71, 267-272	2.5	32
276	Hydrogenated amorphous silicon p-doping with diborane, trimethylboron and trimethylgallium. **1992**, 55, 573-581		23
275	Light-induced defects in thermal annealed hydrogenated amorphous silicon. **1992**, 28, 49-57		1
274	Investigation on electronic density of states in a-SixC1-x: H films. **1993**, 70-71, 664-668		7
273	Thickness dependence of optical gap and absorption tail for amorphous germanium films. **1993**, 87, 5-8		7
272	Metastability of phosphorus and boron in hydrogenated amorphous silicon. **1993**, 1, 255-267		
271	Analysis of the oxidation of polycrystalline zinc selenide by spectroscopic ellipsometry and photothermal deflection spectroscopy. **1993**, 234, 557-560		15
270	Aging effects in a-Si:H pin solar cells investigated by below gap modulated photocurrent spectroscopy. **1993**, 164-166, 247-250		1
269	Photoconductivity spectroscopy (CPM) on a-Ge:H at low temperatures. **1993**, 164-166, 375-378		6
268	An approach to study the effect of the band tail widths on the photovoltaic performance of p-i-n a-Si: H solar cells. **1993**, 163, 65-73		6
267	Interface state density of SiNX:H/c-Si MIS structure. **1993**, 164-166, 849-852		4
266	Metastable centers and photoconduction in a-SiNx:H. **1993**, 164-166, 1061-1064		8
265	Properties of Au/SiO2/a-Si:H solar cells with wet oxide. **1993**, 16, 305-308		1
264	Thermal wave photopyroelectric characterization of advanced materials: State of the art. **1993**, 18, 113-174		18
263	Origin of the spectral dependence of the nonradiative efficiency in hydrogenated amorphous silicon. *Physical Review B*, **1993**, 47, 9989-9992	3.3	1
262	.		3
261	Nonequilibrium occupancy of tail states and defects in a-Si:H: Implications for defect structure. *Physical Review B*, **1993**, 48, 14198-14207	3.3	38
260	Optical absorption spectrum of hydrogenated amorphous silicon using photo-pyroelectric spectroscopy. *Journal of Applied Physics*, **1993**, 74, 1799-1804	2.5	4

259	On the lack of correlation between film properties and solar cell performance of amorphous silicon-germanium alloys. *Applied Physics Letters*, **1993**, 62, 1399-1401	3.4	47
258	Defect chemical potential and the density of states in amorphous silicon. **1993**, 70, 1654-1657		33
257	Improved defect-pool model for charged defects in amorphous silicon. *Physical Review B*, **1993**, 48, 10815-10827	3.3	257
256	Optical-bias effects in electron-drift measurements and defect relaxation in a-Si:H. *Physical Review B*, **1993**, 48, 8658-8666	3.3	40
255	Defect formation during growth of hydrogenated amorphous silicon. *Physical Review B*, **1993**, 47, 3661-3670	3.3	150
254	Evidence for Different Kinds of Dangling Bond Defects in a-Si:H. *Materials Research Society Symposia Proceedings*, **1993**, 297, 195		6
253	Doping Efficiency of N-Type a-Si:H Doped With a Liquid Organic Source. *Materials Research Society Symposia Proceedings*, **1993**, 297, 503		
252	Are There Charged Dangling Bonds in Device Quality Amorphous Silicon?. *Materials Research Society Symposia Proceedings*, **1993**, 297, 201		11
251	Hydrogen and Lithium Diffusion in Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1993**, 297, 285		3
250	Subthreshold Characteristics and Interface State Density of a-Si:H TFT. *Materials Research Society Symposia Proceedings*, **1993**, 297, 889		5
249	Effects of thermal annealing on the optoelectronic properties of hydrogenated amorphous germanium. **1994**, 69, 387-396		16
248	Novel Structure for Measuring the Density-of-State Distribution of High-Resistivity Semiconductor Films by Isothermal Capacitance Transient Spectroscopy. **1994**, 33, 6727-6732		7
247	Steady-state optical modulation spectroscopy of p-type a-Si:H. *Physical Review B*, **1994**, 50, 7422-7427	3.3	5
246	Contribution of defects to electronic, structural, and thermodynamic properties of amorphous silicon. *Journal of Applied Physics*, **1994**, 75, 7266-7286	2.5	68
245	Properties of amorphous silicon/amorphous silicon-germanium multilayers. *Journal of Applied Physics*, **1994**, 75, 1638-1655	2.5	15
244	Charged defect states in intrinsic hydrogenated amorphous silicon films. *Journal of Applied Physics*, **1994**, 76, 2260-2263	2.5	44
243	Improved quality a-SiC:H films prepared by photo chemical vapour decomposition of silane and acetylene. **1994**, 33, 517-531		2
242	Depletion layer width in undoped a-Si:H Schottky barrier revealed by reverse bias photocurrent. *Journal of Applied Physics*, **1994**, 75, 3522-3529	2.5	5

241	1/f Noise Measurements of Hydrogenated Amorphous Silicon-Carbon Alloys. *Materials Research Society Symposia Proceedings*, **1994**, 336, 631		1
240	Defect Distribution and Bonding Structure in High Band Gap a-Si1▯Cx:H Films Deposited in H2. *Materials Research Society Symposia Proceedings*, **1994**, 336, 517		6
239	Improvement of film stability of a-Si:H deposited by RPCVD using SiH/sub 2/Cl/sub 2/.		
238	Photoconductivity spectroscopy of hydrogenated amorphous silicon. **1994**, 70, 277-293		2
237	Light-induced metastable changes in amorphous silicon nitride. **1994**, 69, 359-376		19
236	Electric and Optical Properties of µc-Si,Ge:H Alloys Deposited by Reactive Magnetron Sputtering (RMS). *Materials Research Society Symposia Proceedings*, **1995**, 403, 471		1
235	Nonlinear Optical Defect Absorption in Hydrogenated Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **1995**, 377, 203		
234	Equilibration in Amorphous Silicon Nitride Alloys. *Materials Research Society Symposia Proceedings*, **1995**, 377, 349		2
233	Optoelectronic Properties of High-Gap Amorphous Silicon-Carbon Alloys. *Materials Research Society Symposia Proceedings*, **1995**, 377, 565		1
232	Interface properties of a-Si:H/a-SiCx:H superlattice. **1995**, 258, 132-136		3
231	Study of RF Sputtered a?Si: H and a?Ge: H by Photothermal Deflection Spectroscopy. *Physica Status Solidi (B): Basic Research*, **1995**, 192, 535-541	1.3	2
230	Optical absorption of microcrystalline Si-Ni thin films. *Journal of Applied Physics*, **1995**, 78, 1987-1991	2.5	1
229	Transport and photoluminescence of hydrogenated amorphous silicon▯arbon alloys. *Journal of Applied Physics*, **1995**, 78, 3164-3173	2.5	53
228	Defect-induced absorption-band-edge values in beta -FeSi2. *Physical Review B*, **1995**, 52, 1692-1697	3.3	36
227	Direct measurement of the deep defect density in thin amorphous silicon films with the ▯bsolute▯ constant photocurrent method. *Journal of Applied Physics*, **1995**, 78, 6203-6210	2.5	75
226	Influence of deposition parameters on defect formation in a-SiGe:H alloys. **1995**, 71, 851-869		12
225	Improved analysis of the constant photocurrent method. **1995**, 72, 489-504		15
224	Theoretical Study for Drastic Improvement of Solar Cell Efficiency. **1995**, 34, 2252-2259		5

223	Precise measurement of the deep defects and surface states in a-Si:H films by absolute CPM. **1996**, 198-200, 304-308		11
222	Equilibration in amorphous silicon nitride alloys. **1996**, 198-200, 601-604		
221	Investigation of interface state density between a-Si:H and insulating layers by ESR and photothermal deflection spectroscopy. **1996**, 198-200, 778-781		4
220	Low temperature fabrication of APCVD a-Si thin film transistors with ion doped layer. **1996**, 198-200, 1141-1145		
219	Photoluminescence in Hydrogenated Amorphous Silicon with Sulfur. *Materials Research Society Symposia Proceedings*, **1996**, 420, 605		2
218	Sub-bandgap absorption of gallium nitride determined by Photothermal Deflection Spectroscopy. **1996**, 97, 365-370		107
217	Effects of power density and molecule dwell time on compositional and optoelectronic properties of a-SiC : H alloys. **1996**, 98, 617-622		6
216	Light induced defects in amorphous silicon-carbon alloys a-SiC:H. **1996**, 6, 13-16		1
215	Growth of by low-pressure MOCVD using triethylgallium and tritertbutylaluminium. **1996**, 167, 1-7		17
214	Effective capture rates of carriers in amorphous hydrogenated silicon. *Journal of Applied Physics*, **1996**, 80, 2305-2310	2.5	6
213	In-plane photoconductivity in amorphous silicon doping multilayers. **1996**, 74, 331-347		1
212	Defect formation during deposition of undoped a-Si:H by rf glow discharge. *Physical Review B*, **1997**, 55, 4323-4331	3.3	8
211	Transient photoconductivity with optical bias in undoped and slightly n-doped hydrogenated amorphous silicon. *Physical Review B*, **1997**, 55, 10528-10540	3.3	1
210	Differences in the densities of charged defect states and kinetics of Staebler–Wronski effect in undoped (nonintrinsic) hydrogenated amorphous silicon thin films. *Journal of Applied Physics*, **1997**, 81, 3526-3536	2.5	38
209	Effect of Cl incorporation on the performance of amorphous silicon thin film transistors. *Journal of Applied Physics*, **1997**, 82, 4081-4085	2.5	6
208	Silicon (Amorphous) (a-Si). **1997**, 571-586		5
207	Chapter 5 Photothermal Deflection Spectroscopy Characterization of Ion-Implanted and Annealed Silicon Films. **1997**, 46, 151-177		1
206	Photothermal/Photoacoustic Spectroscopic Measurements of Optical Absorption Coefficients in Semiconductors. **1997**, 59-97		0

205	Light-Soaking Effects on Photoconductivity in a-Si:H Thin Films. *Materials Research Society Symposia Proceedings*, **1997**, 467, 109		
204	Defect Formation Mechanism During PECVD of a-Si:H. *Materials Research Society Symposia Proceedings*, **1997**, 467, 573		
203	On the Compensation Mechanism of Amorphous Silicon Films: Study of Stability. *Materials Research Society Symposia Proceedings*, **1997**, 467, 91		3
202	Insight on the microscopical structure of a-C and a-C:H thin films through electron spin resonance analysis. **1997**, 6, 725-729		14
201	Investigation of amorphous silicon compensated materials over a wide range of dopant concentrations. **1997**, 303, 269-272		8
200	Growth of and AlGaN by MOCVD using triethylgallium and tritertiarybutylaluminium. **1997**, 170, 335-339		19
199	Thick-layered etched-contact amorphous silicon transistors. **1998**, 45, 465		8
198	Improvement of the reliability of amorphous silicon transistors by conduction-band tail width reduction. **1998**, 45, 2179-2186		4
197	New experimental facts on the Staebler�Wronski effect. **1998**, 227-230, 316-319		10
196	Defect formation mechanism during plasma enhanced chemical vapor deposition of undoped a-Si:H. **1998**, 227-230, 43-47		2
195	Amorphous silicon-based guided-wave passive and active devices for silicon integrated optoelectronics. **1998**, 4, 997-1002		57
194	An improved analysis for band edge optical absorption spectra in hydrogenated amorphous silicon from optical and photoconductivity measurements. *Applied Physics Letters*, **1998**, 72, 1057-1059	3.4	38
193	Microdoped and microcompensated amorphous silicon films for infrared detection. **1998**, 10, 1147-1149		5
192	Optical and transport properties of amorphous and microcrystalline silicon films prepared by excimer laser assisted rf glow-discharge deposition. **1998**, 16, 436-443		12
191	Determination of surface states in hydrogenated amorphous silicon by subgap absorption measurements. **1998**, 77, 945-957		2
190	Effect of hydrogen dilution on the optical properties of hydrogenated amorphous silicon prepared by plasma deposition. **1999**, 79, 387-405		30
189	Optoelectronic and structural properties of amorphous silicon�arbon alloys deposited by low-power electron-cyclotron resonance plasma-enhanced chemical-vapor deposition. *Journal of Applied Physics*, **1999**, 85, 3327-3338	2.5	71
188	Experimental evidence of boron induced charged defects in amorphous silicon materials. **1999**, 348, 79-83		2

187	Effect of annealing on the electrical, optical and structural properties of hydrogenated amorphous silicon films deposited in an asymmetric R.F. plasma CVD system at room temperature. **1999**, 57, 373-391		24
186	Study of the transient response of microcompensated amorphous silicon detector in the near infrared range. **1999**, 46, 1140-1145		4
185	Luminescence quenching in 150 keV proton irradiated a-SiC:H. **1999**, 148, 578-582		6
184	Study of photoconductivity and persistent photoconductivity in sulphur-doped amorphous hydrogenated silicon. **1999**, 86, 1321-1332		2
183	Defect luminescence of nitrogen-doped hydrogenated amorphous germanium thin films. **1999**, 39, 240-243		
182	Near Infrared Response of Amorphous Silicon Detector Grown with Microcompensated Absorber Layer. *Materials Research Society Symposia Proceedings*, **1999**, 557, 839		1
181	Optical, electrical and structural properties of hydrogenated amorphous Si-C alloys deposited by different hydrocarbon gas mixtures. **2000**, 80, 497-506		8
180	Photodegradation in a-Si:H Prepared by Hot-Wire CVD as a Function of Substrate and Filament Temperatures. *Materials Research Society Symposia Proceedings*, **2000**, 609, 2271		
179	Temperature Dependence of the Photoinduced Degradation and Annealing in a-Si:H. *Materials Research Society Symposia Proceedings*, **2000**, 609, 341		2
178	Amorphous silicon alloy photovoltaic research□present and future. **2000**, 8, 141-150		31
177	Gap states and stability of rapidly deposited hydrogenated amorphous silicon films. **2000**, 72, 197-199		3
176	Optical gap and photoluminescence properties of amorphous silicon alloys. **2000**, 80, 741-753		6
175	Interference fringe-free transmission spectroscopy of amorphous thin films. *Journal of Applied Physics*, **2000**, 88, 5764-5771	2.5	15
174	Light-induced structural changes and their correlation to metastable defect creation in intrinsic hydrogenated amorphous silicon films. *Physical Review B*, **2000**, 62, 7169-7178	3.3	33
173	Charge modulation spectra in phosphorus-doped a-Si:H. **2000**, 266-269, 227-231		2
172	On the relation between defect density and dopant concentration in amorphous silicon films. **2000**, 266-269, 565-568		6
171	Contribution of ions to the growth of amorphous, polymorphous, and microcrystalline silicon thin films. *Journal of Applied Physics*, **2000**, 88, 3674-3688	2.5	87
170	Amorphous silicon (a-Si) electrical conductivity. 1-2		

169	Ex situ and in situ defect density measurements of a-Si:H by means of the cavity ring down absorption technique. *Materials Research Society Symposia Proceedings*, **2001**, 664, 2241		4
168	Changes in hydrogenated amorphous silicon upon extensive light-soaking at elevated temperature. *Materials Research Society Symposia Proceedings*, **2001**, 664, 1261		3
167	Optical absorption and transport mechanisms of dual ion-beam-deposited boron-rich boron nitride films. **2001**, 388, 217-225		9
166	Study of the optical properties and the density-of-states distribution of hydrogenated amorphous silicon-nitrogen alloy. **2001**, 81, 1951-1962		2
165	Photoluminescence yield and decay time of proton irradiated and thermally annealed a-Si0.35C0.65:H alloys: A phenomenological model. *Journal of Applied Physics*, **2001**, 90, 682-688	2.5	
164	Effects of microwave power on the structural and emission properties of hydrogenated amorphous silicon carbide deposited by electron cyclotron resonance chemical vapor deposition. *Journal of Applied Physics*, **2001**, 89, 2699-2705	2.5	21
163	Various defect states in a-Si:H studied by modulated photoconductivity spectroscopy. *Physical Review B*, **2002**, 65,	3.3	12
162	Direct measurement of Urbach tail and gap state absorption in CuGaSe2 thin films by photothermal deflection spectroscopy and the constant photocurrent method. *Journal of Applied Physics*, **2002**, 92, 3016-3020	2.5	47
161	Bulk and surface defects in a-Si:H films studied by means of the cavity ring down absorption technique. **2002**, 299-302, 610-614		13
160	Defect transition energies and the density of electronic states in hydrogenated amorphous silicon. **2002**, 299-302, 621-625		6
159	Photoluminescence and sub band gap absorption of CuGaSe2 thin films. **2002**, 403-404, 495-499		22
158	Effect of light soaking and annealing on the stability of hydrogenated amorphous silicon films deposited using pure and highly helium diluted silane. **2002**, 122, 259-264		3
157	Optical and transport properties of defective non-crystalline solids. **2003**, 77, 947-952		1
156	Density of states in hydrogenated amorphous germanium seen via optical absorption spectra. **2003** , 126, 675-680		13
155	Dependence of field-emission threshold in diamond-like carbon films grown by various techniques. **2003**, 72, 183-192		20
154	Empirical calibration of the optical gap in a-Si1�Cx:H (x. **2003**, 98, 161-166		16
153	Chapter 6 Transport and defect properties of intrinsic and boron-doped diamond. **2003**, 76, 261-324		9
152	Correlation of residual stress with optical absorption edge in diamond-like carbon films. **2003**, 12, 1576-1583		14

151	Chapter 7 Optical properties of CVD diamond. **2003**, 76, 325-377		14
150	Semiconductors, Amorphous‐Electronic Properties. **2003**,		
149	Semiconductors, Amorphous‐Material Properties. **2003**,		
148	Effect of the hydrogen dilution on the short-range and intermediate-range-order in radiofrequency magnetron sputtered hydrogenated amorphous silicon films. *EPJ Applied Physics*, **2004**, 28, 19-26	1.1	1
147	Properties of Hydrogenated Microcrystalline Cubic Silicon Carbide Films Deposited by Hot Wire Chemical Vapor Deposition at a Low Substrate Temperature. **2004**, 43, L1190-L1192		28
146	Light-induced modification of a-SiOx:H. I: Metastability. *Journal of Applied Physics*, **2004**, 95, 4046-4059	2.5	4
145	Hydrogen Injection in ETP Plasma Jet for Fast-Deposition of High-Quality a-Si:H. *Materials Research Society Symposia Proceedings*, **2004**, 808, 609		
144	Tritium Induced Defects in Amorphous Silicon. *Materials Research Society Symposia Proceedings*, **2004**, 808, 89		4
143	Gap state absorption in AlGaN photoconductors and solar-blind photodetectors. **2004**, 1, 233-237		8
142	Optimisation of the RF power density to obtain good quality hydrogenated amorphous silicon films in a home-made glow discharge system. **2004**, 25, 335-339		1
141	Doping and its efficiency in a‐SiOx:H. *Physical Review B*, **2004**, 69,	3.3	48
140	Absorption phenomena in organic thin films for solar cell applications investigated by photothermal deflection spectroscopy. **2005**, 40, 1413-1418		132
139	Doping effects of dimethyl-tin-dichloride on material properties of CdS films and on formation of CdS‐CdTe heterostructures. *Journal of Applied Physics*, **2005**, 98, 013535	2.5	6
138	Optical study of disorder and defects in hydrogenated amorphous silicon carbon alloys. *Applied Physics Letters*, **2005**, 87, 011903	3.4	9
137	New calibration method for UV‐VIS photothermal deflection spectroscopy set-up. **2006**, 253, 158-162		5
136	Sub-bandgap optical absorption spectroscopy of hydrogenated microcrystalline silicon thin films prepared using hot-wire CVD (Cat-CVD) process. **2006**, 501, 121-124		7
135	Measuring the role of surface chemistry in silicon microphotonics. *Applied Physics Letters*, **2006**, 88, 131114	3.4	65
134	Optical properties of amorphous GeTe, Sb2Te3, and Ge2Sb2Te5: The role of oxygen. *Journal of Applied Physics*, **2006**, 99, 103508	2.5	51

133	Hydrogen-bonding configuration effects on the optoelectronic properties of glow discharge a-Si1▯Gex:H with largex. **2007**, 19, 356215		12
132	H1 NMR electron-nuclear cross relaxation in thin films of hydrogenated amorphous silicon. *Physical Review B*, **2007**, 76,	3.3	
131	Relationship between the optical absorption and the density of deep gap states in microcrystalline silicon. *Journal of Applied Physics*, **2007**, 102, 103501	2.5	19
130	Near infrared absorption of Si nanoparticles embedded in silica films. **2007**, 601, 2912-2916		5
129	The influence of thermal annealing on the electronic defect states in nanocrystalline CVD diamond films. **2008**, 205, 2158-2162		4
128	Characterization of semiconducting polymers for thin film transistors. **2008**, 26, 445		17
127	Interfacial effects in thin films of polymeric semiconductors. **2008**, 26, 1454		5
126	Electrical transport in laser-crystallized polycrystalline silicon-germanium thin-films. *Applied Physics Letters*, **2009**, 95, 062101	3.4	11
125	Simulation and experimental study on the characteristics of plasma-induced damage and methodology for accurate damage analysis. **2009**,		
124	Defects in hydrogenated amorphous silicon carbide alloys using electron spin resonance and photothermal deflection spectroscopy. *Materials Research Society Symposia Proceedings*, **2009**, 1153, 1		
123	Insights and challenges toward understanding the electronic properties of hydrogenated nanocrystalline silicon. **2009**, 89, 2541-2555		2
122	Optical spectroscopy study of nc-Si-based p▯ solar cells. **2009**, 93, 1768-1772		17
121	High temperature dependence of the cubic phase content and optical properties of BN thin films. **2009**, 203, 1220-1224		1
120	Optical properties of hexagonal boron nitride thin films deposited by radio frequency bias magnetron sputtering. **2009**, 18, 4013-4018		27
119	Relationship between defect density and charge carrier transport in amorphous and microcrystalline silicon. *Physical Review B*, **2009**, 79,	3.3	49
118	Laser applications in thin-film photovoltaics. **2010**, 100, 427-436		30
117	Defect reduction in silicon nanoparticles by low-temperature vacuum annealing. *Applied Physics Letters*, **2010**, 96, 193112	3.4	31
116	Optical and Electrical Characterization of Hydrogen-Plasma-Damaged Silicon Surface Structures and Its Impact on In-line Monitoring. **2010**, 49, 08JD02		46

115	Semiconducting □-FeSi2 for high efficiency and low cost photovoltaics. **2010**,		
114	Amorphous Silicon-Based Solar Cells. **2011**, 487-545		10
113	THz Medical Imaging: Hydration Sensing. **2011**, 1, 201-219		215
112	Anneal treatment to reduce the creation rate of light-induced metastable defects in device-quality hydrogenated amorphous silicon. *Applied Physics Letters*, **2011**, 98, 201908	3.4	10
111	Determination of the Density of States on N-type Ptcdi-c13 Organic Thin-film Semiconductor. *Materials Research Society Symposia Proceedings*, **2012**, 1435, 36		
110	Optical properties of amorphous high-k LaGdO3 films and its band alignment with Si. *Journal of Applied Physics*, **2012**, 111, 044106	2.5	14
109	Films thickness effect on structural and optoelectronic properties of hydrogenated amorphous germanium (a-Ge:H). **2012**, 358, 1404-1409		4
108	Modification of structure and optical band-gap of nc-Si:H films with ion irradiation. **2012**, 286, 308-312		1
107	Relation of defects and grain boundaries to transport and photo-transport: Solved and unsolved problems in microcrystalline silicon. **2012**, 358, 1946-1953		8
106	Metastability effects in hydrogenated microcrystalline silicon thin films investigated by the dual beam photoconductivity method. **2012**, 358, 2074-2077		12
105	Contact Formation on a-Si:H/c-Si Heterostructure Solar Cells. **2012**, 331-375		6
104	Graphene photonics, plasmonics, and broadband optoelectronic devices. **2012**, 6, 3677-94		1468
103	Advanced modeling for optical characterization of amorphous hydrogenated silicon films. **2013**, 541, 12-16		9
102	Argon ion beam assisted magnetron sputtering deposition of boron-doped a-Si:H thin films with improved conductivity. **2013**, 378, 177-180		6
101	Roles of the Fermi level of doped a-Si:H and band offsets at a-Si:H/c-Si interfaces in n-type HIT solar cells. *Solar Energy*, **2013**, 97, 168-175	6.8	26
100	Amorphous Silicon Solar Cells. **2013**, 721-738		
99	Thin-film limit formalism applied to surface defect absorption. **2014**, 22, 31466-72		5
98	Band tail recombination in polymer:fullerene organic solar cells. *Journal of Applied Physics*, **2014**, 116, 074503	2.5	45

97	Deposition of intrinsic hydrogenated amorphous silicon for thin-film solar cells □a comparative study for layers grown statically by RF-PECVD and dynamically by VHF-PECVD. **2014**, 22, 198-207		5
96	Solution-Based Silicon in Thin-Film Solar Cells. **2014**, 4, 1301871		26
95	Efficient hybrid inorganic/organic tandem solar cells with tailored recombination contacts. **2014**, 127, 157-162		20
94	A study on the variation of c-Si solar cell parameters under 8 MeV electron irradiation. **2014**, 120, 191-196		5
93	Ellipsometric characterization of multi-component thin films: Determination of elemental content from optical dispersion. **2014**, 550, 239-249		2
92	In situ manipulation of the sub gap states in hydrogenated amorphous silicon monitored by advanced application of Fourier transform photocurrent spectroscopy. **2014**, 129, 70-81		22
91	Organometallic Halide Perovskites: Sharp Optical Absorption Edge and Its Relation to Photovoltaic Performance. **2014**, 5, 1035-9		1699
90	Universal dispersion model for characterization of optical thin films over a wide spectral range: application to hafnia. **2015**, 54, 9108-19		38
89	Microstructural and Electronic Origins of Open-Circuit Voltage Tuning in Organic Solar Cells Based on Ternary Blends. **2015**, 5, 1501335		58
88	Electronic structure. 86-116		
87	Electrical characterization of hydrogenated amorphous silicon oxide films. **2015**, 54, 08KB11		5
86	Infrared Absorption of Femtosecond Laser Textured Silicon Under Vacuum. **2015**, 27, 1481-1484		21
85	Photothermal investigation of poly (3-hexylthiophene): ZnSe nanocomposites. **2015**, 119, 581-588		3
84	Comparing n- and p-type polycrystalline silicon absorbers in thin-film solar cells. **2015**, 579, 144-152		5
83	Graphene-Based Photonics and Plasmonics. **2015**, 93-126		2
82	Properties of Phosphorus-Doped Silicon-Rich Amorphous Silicon Carbide Film Prepared by a Solution Process. **2016**, 99, 1651-1656		6
81	Electronic and Optical Properties of Amorphous Silicon. **2016**, 61-155		
80	On the way to enhance the optical absorption of a-Si in NIR by embedding Mg2Si thin film. *Applied Physics Letters*, **2016**, 109, 043902	3.4	10

79	Absorption and Photocurrent Spectroscopy with High Dynamic Range. **2016**, 189-214		4
78	Analysis of burn-in photo degradation in low bandgap polymer PTB7 using photothermal deflection spectroscopy. **2016**, 6, 103899-103904		29
77	The Optical and Electrical Properties of Co-Doped Black Silicon Textured by a Femtosecond Laser and Its Application to Infrared Light Sensing. **2016**, 16, 5227-5231		9
76	A Hybrid Barium Titanate–Silicon Photonics Platform for Ultraefficient Electro-Optic Tuning. **2016**, 34, 1688-1693		56
75	Optical properties of graphitic carbon nitride films prepared by evaporation. **2016**, 65, 83-86		12
74	Thick-Film High-Performance Bulk-Heterojunction Solar Cells Retaining 90% PCEs of the Optimized Thin Film Cells. **2017**, 3, 1700007		29
73	Ultra-sensitive near-infrared graphene photodetectors with nanopillar antennas. *Nanoscale*, **2017**, 9, 17459-17464	7.7	27
72	Promoting Charge Separation and Injection by Optimizing the Interfaces of GaN:ZnO Photoanode for Efficient Solar Water Oxidation. **2017**, 9, 30696-30702		27
71	Rapid and controllable a-Si:H-to-nc-Si:H transition induced by a high-density plasma route. **2017**, 50, 385103		3
70	Properties of silicon nanocrystals with boron and phosphorus doping fabricated via silicon rich oxide and silicon dioxide bilayers. **2017**, 4, 075004		7
69	Investigation of high performance TiO2 nanorod array perovskite solar cells. **2017**, 5, 15970-15980		48
68	Obtainment of the density of states in the band tails of hydrogenated amorphous silicon. *Journal of Applied Physics*, **2017**, 122, 085702	2.5	3
67	Amorphous Silicon with Extremely Low Absorption: Beating Thermal Noise in Gravitational Astronomy. **2018**, 121, 191101		18
66	Optical absorption spectra of Cu2ZnSn(S,Se)4 thin-film solar cells by Fourier transform photocurrent spectroscopy. **2018**, 57, 08RC16		3
65	Porphyrin-based thick-film bulk-heterojunction solar cells for indoor light harvesting. **2018**, 6, 9111-9118		55
64	Materials challenges for the Starshot lightsail. *Nature Materials*, **2018**, 17, 861-867	27	63
63	Spin-coated planar SbS hybrid solar cells approaching 5% efficiency. *Beilstein Journal of Nanotechnology*, **2018**, 9, 2114-2124	3	16
62	Key signal contributions in photothermal deflection spectroscopy. *Journal of Applied Physics*, **2019**, 126, 025106	2.5	5

61	Charge transfer-induced photoluminescence in ZnO nanoparticles. *Nanoscale*, **2019**, 11, 8736-8743	7.7	26
60	Liquid Silicon Family Materials(2): SiC. **2019**, 93-136		
59	Impact of fluorine on organic cation for determining the electronic and optical properties of CH3FxNH3PbI3 (x = 0, 1, 2, 3) hybrid perovskites-based photovoltaic devices. *Solar Energy*, **2019**, 177, 517-530	6.8	7
58	Defect Absorption in Ge2Sb2Te5 Phase-Change Films. *Physica Status Solidi (B): Basic Research*, **2020**, 257, 1900278	1.3	4
57	Investigation of the structure and optical absorption of silicon coated with a chromium film after femtosecond laser irradiation. *Semiconductor Science and Technology*, **2020**, 35, 015019	1.8	4
56	Optical absorption and photoluminescence spectroscopy. **2020**, 49-79		5
55	Mid-IR photothermal beam deflection technique for fast measurement of thermal diffusivity and highly sensitive subsurface imaging. *Journal of Applied Physics*, **2020**, 127, 173101	2.5	4
54	Sub-bandgap optical spectroscopy of epitaxial -Ga2O3 thin films. *Applied Physics Letters*, **2020**, 116, 092102	3.4	3
53	Defect absorption in selenium films by photothermal deflection spectroscopy. *EPJ Applied Physics*, **2020**, 89, 10301	1.1	
52	Suppressing Ion Migration across Perovskite Grain Boundaries by Polymer Additives. *Advanced Functional Materials*, **2021**, 31, 2006802	15.6	33
51	Research on Measuring Thermal Conductivity of Quartz and Sapphire Glass Using Rear-Side Photothermal Deflection Method. *Applied Sciences (Switzerland)*, **2021**, 11, 1535	2.6	0
50	Photothermal Plasmonic Actuation of Micromechanical Cantilever Beams. *Physical Review Applied*, **2021**, 15,	4.3	0
49	Charge transport physics of a unique class of rigid-rod conjugated polymers with fused-ring conjugated units linked by double carbon-carbon bonds. *Science Advances*, **2021**, 7,	14.3	7
48	The Relation Between Precursor Gas Flows, Thickness Dependent Material Phases, and Opto-Electrical Properties of Doped a/nc-SiOX:H Films. *IEEE Journal of Photovoltaics*, **2021**, 11, 591-599	3.7	0
47	Sub-bandgap absorption and photo-response of molybdenum heavily doped black silicon fabricated by a femtosecond laser. *Optics Letters*, **2021**, 46, 3300-3303	3	4
46	Evaluation of Hydrogenated Amorphous Silicon Oxide Photo-Absorber from Quantum Efficiency in Thin-Film Solar Cell by Fourier Transform Photocurrent Spectroscopy. *Materials Transactions*, **2021**, 62, 1263-1269	1.3	1
45	How photoluminescence can predict the efficiency of solar cells. *JPhys Materials*,	4.2	2
44	Feasibility of Novel Rear-Side Mirage Deflection Method for Thermal Conductivity Measurements. *Sensors*, **2021**, 21,	3.8	

43	Sputtered material. **1984**, 119-175		8
42	CVD material. **1984**, 177-202		3
41	Recent advances. *Topics in Applied Physics*, **1979**, 331-343	0.5	1
40	Theory of electronic structure. *Topics in Applied Physics*, **1984**, 5-60	0.5	20
39	The spectroscopy of localized states. *Topics in Applied Physics*, **1984**, 195-259	0.5	17
38	Time-resolved charge transport in hydrogenated amorphous silicon. *Topics in Applied Physics*, **1984**, 261-300	0.5	40
37	Dangling Bonds and Metastability in Semiconductors. **1987**, 625-633		1
36	a-Si:H TFT Thin Film and Substrate Materials. **2004**, 15-78		7
35	Photoacoustic and Photothermal Characterization of Amorphous Semiconductors Thin Films. **1991**, 199-204		2
34	Band Edges and Gap States by Optical Absorption and Electron Spin Resonance in Amorphous Carbon (a-C) and Hydrogenated Amorphous Carbon (a-C:H). *NATO ASI Series Series B: Physics*, **1991**, 427-437		1
33	Chemistry and Physics of Covalent Amorphous Semiconductors. **1985**, 5-103		26
32	Electrical, Optical and Structural Properties of A-SiGe:H Films. **1987**, 609-613		1
31	A New Approach for Characterizing Surface Interface and Bulk Defects in a-Si:H. **1991**, 128-131		1
30	Silicon (Amorphous) (a-Si). **1985**, 571-586		25
29	Analysis of Surfaces Exposed to Plasmas by Nondestructive Photoacoustic and Photothermal Techniques. **1989**, 211-326		16
28	Propriétés électroniques et schémas de bandes dans les semi-conducteurs amorphes. I. Concepts fondamentaux. *Annales De Physique*, **1991**, 16, 261-304		4
27	Defects. **2003**, 158-202		2
26	BASIC PROPERTIES OF HYDROGENATED MICROCRYSTALLINE SILICON. **2010**, 97-143		2

25	Thin Film Cavity Ringdown Spectroscopy and Second Harmonic Generation on Thin a-Si:H Films. *Materials Research Society Symposia Proceedings*, **2003**, 762, 1981		2
24	Amorphous Semiconductors: Doping. **2001**, 264-270		
23	Material Properties of Hydrogenated Amorphous Silicon.		
22	Photothermal spectroscopy and Its application. **1985**,		
21	Doping Effects in Amorphous Silicon. **1985**, 845-850		
20	Defect Passivation and Photoconduction in Sputtered a-Ge:H. **1985**, 147-156		
19	Theory of Dangling Orbital Defects at the Si/SiO2 Interface. **1988**, 237-247		
18	Optical Modulation Spectroscopy of Native Defects in Amorphous Semiconductors and Conducting Polymers. **1988**, 197-205		
17	References. **1988**, 517-538		
16	Photopyroelectric Spectroscopy (P2ES) of a-Si:H Thin Semiconducting Films on Quartz. **1989**, 1255-1262		
15	Hydrogen related effects in a-Si:H studied by photothermal deflection spectroscopy. **1991**, 269-272		
14	Modeling aspects for high precision absorption measurements. **2019**,		
13	Review: Optoelectronic Response and van der Waals Materials. *Springer Theses*, **2020**, 37-77	0.1	
12	Record-High Continuous-Wave Nonlinear Performance of Amorphous Silicon Waveguides. **2020**,		1
11	Amorphous silicon (a-Si) absorption edge and optical spectra. 1-2		
10	Amorphous silicon (a-Si) figures to absorption edge and optical spectra. 1-30		
9	What ails the photovoltaic performance in single-layered unpoled BFO? The role of oxygen annealing in improving the photovoltaic efficiency. *Solar Energy*, **2022**, 236, 822-831	6.8	0
8	Characterization of Semiconductors from Photoconductivity Techniques: Uniform and Polychromatic Illumination. **2022**, 125-150		

7	Life on the Urbach Edge. **2022**, 13, 7702-7711	6
6	Sub-bandgap photo-response of metal-black silicon-metal photodiodes.	0
5	Charge generation in organic solar cells: Journey toward 20% power conversion efficiency.	1
4	Chalcopyrite solar cells state-of-the-art and options for improvement. **2023**, 66,	0
3	Sub-bandgap photo-response of Mo-hyperdoped black silicon MSM photodetectors. **2023**, 55,	0
2	Connecting electrical current conduction and Urbach energy in doped BiFeO3 thin-films. **2023**, 298, 127468	0
1	Subgap Absorption in Organic Semiconductors. **2023**, 14, 3174-3185	0