Guangming Tao

List of Publications by Year
in descending order

77 papers	3,144 citations	185998 28 h-index	155451 55 g-index
78 all docs	78 docs citations	78 times ranked	2647 citing authors

#	Article	IF	Citations
1	Intelligent Fabric Enabled 6G Semantic Communication System for In-Cabin Scenarios. IEEE Transactions on Intelligent Transportation Systems, 2023, 24, 1153-1162.	4.7	3
2	Magnetoelectrical Clothing Generator for Highâ€Performance Transduction from Biomechanical Energy to Electricity. Advanced Functional Materials, 2022, 32, 2107682.	7.8	21
3	Magnetoelectrical Clothing Generator for Highâ€Performance Transduction from Biomechanical Energy to Electricity (Adv. Funct. Mater. 6/2022). Advanced Functional Materials, 2022, 32, .	7.8	0
4	Negative Information Measurement at AI Edge: A New Perspective for Mental Health Monitoring. ACM Transactions on Internet Technology, 2022, 22, 1-16.	3.0	18
5	Optical Micro/Nano Fibers Enabled Smart Textiles for Humanâ€"Machine Interface. Advanced Fiber Materials, 2022, 4, 1108-1117.	7.9	30
6	Multifunctional Fiberâ€Enabled Intelligent Health Agents. Advanced Materials, 2022, 34, .	11.1	36
7	Use of machine learning to efficiently predict the confinement loss in anti-resonant hollow-core fiber. Optics Letters, 2021, 46, 1454.	1.7	13
8	High-resilience cotton base yarn for anti-wrinkle and durable heat-insulation fabric. Composites Part B: Engineering, 2021, 212, 108663.	5.9	16
9	Cognitive Wearable Robotics for Autism Perception Enhancement. ACM Transactions on Internet Technology, 2021, 21, 1-16.	3.0	16
10	Hierarchical-morphology metafabric for scalable passive daytime radiative cooling. Science, 2021, 373, 692-696.	6.0	410
11	Flexible all-textile dual tactile-tension sensors for monitoring athletic motion during taekwondo. Nano Energy, 2021, 85, 105941.	8.2	77
12	Refractive-index guiding single crystal optical fiber with airâ€"solid cladding. Optical Materials Express, 2021, 11, 2994.	1.6	1
13	High-efficiency solar heat storage enabled by adaptive radiation management. Cell Reports Physical Science, 2021, 2, 100533.	2.8	15
14	Discovering extremely low confinement-loss anti-resonant fibers via swarm intelligence. Optics Express, 2021, 29, 35544.	1.7	12
15	A carbonâ€nanofiber glass composite with high electrical conductivity. International Journal of Applied Glass Science, 2020, 11, 590-600.	1.0	4
16	Thermally drawn advanced functional fibers: New frontier of flexible electronics. Materials Today, 2020, 35, 168-194.	8.3	153
17	Co-axial silicon/perovskite heterojunction arrays for high-performance direct-conversion pixelated X-ray detectors. Nano Energy, 2020, 78, 105335.	8.2	22
18	Functional Probes: Flexible Fiber Probe for Efficient Neural Stimulation and Detection (Adv. Sci.) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 62	5.6	1

#	Article	IF	Citations
19	Stretchable electromagnetic fibers for self-powered mechanical sensing. Applied Materials Today, 2020, 20, 100623.	2.3	12
20	Living with I-Fabric: Smart Living Powered by Intelligent Fabric and Deep Analytics. IEEE Network, 2020, 34, 156-163.	4.9	61
21	Flexible Fiber Probe for Efficient Neural Stimulation and Detection. Advanced Science, 2020, 7, 2001410.	5.6	19
22	Emerging Materials and Strategies for Personal Thermal Management. Advanced Energy Materials, 2020, 10, 1903921.	10.2	290
23	Flexible and Robust Biomaterial Microstructured Colored Textiles for Personal Thermoregulation. ACS Applied Materials & Interfaces, 2020, 12, 19015-19022.	4.0	97
24	Soft bimorph actuator with real-time multiplex motion perception. Nano Energy, 2020, 76, 104926.	8.2	91
25	Superabsorbent Fibers for Comfortable Disposable Medical Protective Clothing. Advanced Fiber Materials, 2020, 2, 140-149.	7.9	35
26	In-Fiber Structured Particles and Filament Arrays from the Perspective of Fluid Instabilities. Advanced Fiber Materials, 2020, 2, 1-12.	7.9	25
27	High-performance zero-standby-power-consumption-under-bending pressure sensors for artificial reflex arc. Nano Energy, 2020, 73, 104743.	8.2	40
28	Machine learning-optimized Tamm emitter for high-performance thermophotovoltaic system with detailed balance analysis. Nano Energy, 2020, 72, 104687.	8.2	53
29	A multifunctional wearable E-textile <i>via</i> integrated nanowire-coated fabrics. Journal of Materials Chemistry C, 2020, 8, 8399-8409.	2.7	64
30	Fiber Changes Our Life. Advanced Fiber Materials, 2019, 1, 1-2.	7.9	12
31	Dual control of the nanofriction of graphene. Journal of Materials Chemistry C, 2019, 7, 6041-6051.	2.7	19
32	Wearable 3.0: From Smart Clothing to Wearable Affective Robot. IEEE Network, 2019, 33, 8-14.	4.9	28
33	Wearable Affective Robot. IEEE Access, 2018, 6, 64766-64776.	2.6	86
34	Scalable In-Fiber Manufacture of Functional Composite Particles. ACS Nano, 2018, 12, 11130-11138.	7.3	12
35	Robust multimaterial chalcogenide fibers produced by a hybrid fiber-fabrication process. Optical Materials Express, 2017, 7, 2336.	1.6	17
36	Influence of the selenium content on thermo-mechanical and optical properties of Geâ€“Gaâ€“Sbâ€“S chalcogenide glasses. Infrared Physics and Technology, 2016, 77, 21-26.	1.3	15

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37	Controlled fragmentation of multimaterial fibres and films via polymer cold-drawing. Nature, 2016, 534, 529-533.	13.7	75
38	Digital design of multimaterial photonic particles. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, 6839-6844.	3.3	17
39	Preparation of chalcogenide glass fiber using an improved extrusion method. Optical Engineering, 2016, 55, 056114.	0.5	26
40	Multi-octave mid-infrared supercontinuum generation in robust chalcogenide nanowires using a thulium-fiber laser. , 2016, , .		0
41	Robust Low-Loss Multimaterial Chalcogenide Fiber for Infrared Applications fabricated by a Hybridized approach. , 2016, , .		0
42	Tuning Light with Photonic Particles. , 2016, , .		0
43	Hybridized Fabrication of Robust Low-Loss Multimaterial Chalcogenide Fiber for Infrared Applications. , 2016, , .		0
44	Advances in infrared fibers. Proceedings of SPIE, 2015, , .	0.8	1
45	Fabrication of an IR hollow-core Bragg fiber based on chalcogenide glass extrusion. Applied Physics A: Materials Science and Processing, 2015, 119, 455-460.	1.1	15
46	Tapered chalcogenideâ€"tellurite hybrid microstructured fiber for mid-infrared supercontinuum generation. Journal of Modern Optics, 2015, 62, 729-737.	0.6	3
47	Freely adjusted properties in Geâ€"S based chalcogenide glasses with iodine incorporation. Infrared Physics and Technology, 2015, 69, 118-122.	1.3	10
48	Third-order nonlinearity in Geâ€"Sbâ€"Se glasses at mid-infrared wavelengths. Materials Research Bulletin, 2015, 70, 204-208.	2.7	39
49	Fabrication and characterization of Geâ€"Sbâ€"Seâ€"I glasses and fibers. Applied Physics A: Materials Science and Processing, 2015, 120, 127-135.	1.1	5
50	Low Loss, High <scp>NA</scp> Chalcogenide Glass Fibers for Broadband Midâ€Infrared Supercontinuum Generation. Journal of the American Ceramic Society, 2015, 98, 1389-1392.	1.9	75
51	Fabrication and characterization of multimaterial chalcogenide glass fiber tapers with high numerical apertures. Optics Express, 2015, 23, 23472.	1.7	48
52	High-resolution chalcogenide fiber bundles for infrared imaging. Optics Letters, 2015, 40, 4384.	1.7	29
53	Infrared fibers. Advances in Optics and Photonics, 2015, 7, 379.	12.1	274
54	Multimaterial Fibers. Springer Series in Surface Sciences, 2015, , 1-26.	0.3	12

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55	Mid-infrared Supercontinuum Generation in Robust Step-Index Chalcogenide Nanotapers Pumped with a Thulium Fiber Laser. , 2014, , .		2
56	Nonlinear characterization of robust multimaterial chalcogenide nanotapers for infrared supercontinuum generation. Journal of the Optical Society of America B: Optical Physics, 2014, 31, 450.	0.9	38
57	Multimaterial disc-to-fiber approach to efficiently produce robust infrared fibers. Optical Materials Express, 2014, 4, 2143.	1.6	18
58	Robust multimaterial tellurium-based chalcogenide glass fibers for mid-wave and long-wave infrared transmission. Optics Letters, 2014, 39, 4009.	1.7	34
59	Drawing robust infrared optical fibers from preforms produced by efficient multimaterial stacked coextrusion. , 2014, , .		1
60	Multimaterial rod-in-tube coextrusion for robust mid-infrared chalcogenide fibers. Proceedings of SPIE, 2014, , .	0.8	4
61	Multimaterial fibers: a new concept in infrared fiber optics. , 2014, , .		5
62	Preparation of Low-loss Ge 15 Ga 10 Te 75 chalcogenide glass for far-IR optics applications. Infrared Physics and Technology, 2014, 65, 77-82.	1.3	17
63	Robust Multimaterial Tellurium-based Chalcogenide Glass Infrared Fibers. , 2014, , .		0
64	In-fiber production of polymeric particles for biosensing and encapsulation. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 15549-15554.	3.3	43
65	Dispersion characterization of chalcogenide bulk glass, composite fibers, and robust nanotapers. Journal of the Optical Society of America B: Optical Physics, 2013, 30, 2498.	0.9	28
66	Efficient Disc-to-fiber Multimaterial Stacked Coextrusion for Robust Infrared Optical Fibers. , 2013, , .		1
67	Octave-spanning infrared supercontinuum generation in robust chalcogenide nanotapers using picosecond pulses. Optics Letters, 2012, 37, 4639.	1.7	46
68	In-fiber fabrication of size-controllable structured particles. , 2012, , .		0
69	Multimaterial preform coextrusion for robust chalcogenide optical fibers and tapers. Optics Letters, 2012, 37, 2751.	1.7	74
70	Multimaterial Fibers. International Journal of Applied Glass Science, 2012, 3, 349-368.	1.0	128
71	Structured spheres generated by an in-fibre fluid instability. Nature, 2012, 487, 463-467.	13.7	174
72	One-step Multi-material Preform Extrusion for Robust Chalcogenide Glass Optical Fibers and Tapers. , 2012, , .		1

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73	One-step Multi-material Preform Extrusion for Robust Chalcogenide Glass Optical Fibers. , 2012, , .		0
74	Multimaterial Fibers for Generating Structured Nanoparticles. , 2012, , .		0
75	Thermal Drawing of High-Density Macroscopic Arrays of Well-Ordered Sub-5-nm-Diameter Nanowires. Nano Letters, 2011, 11, 4768-4773.	4.5	51
76	Formation and Properties of a Novel Heavyâ€Metal Chalcogenide Glass Doped with a High Dysprosium Concentration. Journal of the American Ceramic Society, 2009, 92, 2226-2229.	1.9	23
77	Robust fibers for delivering infrared light. SPIE Newsroom, 0, , .	0.1	0