

# Youbin Zheng

## List of Publications by Year in descending order

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65  
papers

3,766  
citations

101543

36  
h-index

128289

60  
g-index

65  
all docs

65  
docs citations

65  
times ranked

3077  
citing authors

#	ARTICLE	IF	CITATIONS
1	Bioinspired Triboelectric Nanosensors for Self-Powered Wearable Applications. ACS Biomaterials Science and Engineering, 2023, 9, 2087-2102.	5.2	16
2	The marriage of sealant agent between structure transformable silk fibroin and traditional Chinese medicine for faster skin repair. Chinese Chemical Letters, 2022, 33, 1599-1603.	9.0	5
3	A new synergetic system based on triboelectric nanogenerator and corrosion inhibitor for enhanced anticorrosion performance. Nano Energy, 2022, 91, 106696.	16.0	41
4	Highly Efficient Self-Healing Multifunctional Dressing with Antibacterial Activity for Sutureless Wound Closure and Infected Wound Monitoring. Advanced Materials, 2022, 34, e2106842.	21.0	89
5	Surface engineering and on-site charge neutralization for the regulation of contact electrification. Nano Energy, 2022, 91, 106687.	16.0	6
6	Techniques for wearable gas sensors fabrication. Sensors and Actuators B: Chemical, 2022, 353, 131133.	7.8	27
7	Highly Efficient Self-Healing Multifunctional Dressing with Antibacterial Activity for Sutureless Wound Closure and Infected Wound Monitoring (Adv. Mater. 3/2022). Advanced Materials, 2022, 34, .	21.0	6
8	A Wearable Microneedle-Based Extended Gate Transistor for Real-Time Detection of Sodium in Interstitial Fluids. Advanced Materials, 2022, 34, e2108607.	21.0	31
9	Macro-superlubric triboelectric nanogenerator based on tribovoltaic effect. Matter, 2022, 5, 1532-1546.	10.0	40
10	A Wearable Microneedle-Based Extended Gate Transistor for Real-Time Detection of Sodium in Interstitial Fluids (Adv. Mater. 10/2022). Advanced Materials, 2022, 34, .	21.0	3
11	Artificially Intelligent Olfaction for Fast and Noninvasive Diagnosis of Bladder Cancer from Urine. ACS Sensors, 2022, 7, 1720-1731.	7.8	26
12	Quantifying Wetting Dynamics with Triboelectrification. Advanced Science, 2022, 9, .	11.2	6
13	Conductive elastic sponge-based triboelectric nanogenerator (TENG) for effective random mechanical energy harvesting and ammonia sensing. Nano Energy, 2021, 79, 105422.	16.0	67
14	Liquid-solid triboelectric nanogenerators array and its applications for wave energy harvesting and self-powered cathodic protection. Energy, 2021, 217, 119388.	8.8	45
15	New Hydrogen Bonding Enhanced Polyvinyl Alcohol Based Self-Charged Medical Mask with Superior Charge Retention and Moisture Resistance Performances. Advanced Functional Materials, 2021, 31, 2009172.	14.9	83
16	Reversible Temperature-Sensitive Liquid-Solid Triboelectrification with Polycaprolactone Material for Wetting Monitoring and Temperature Sensing. Advanced Functional Materials, 2021, 31, 2010220.	14.9	32
17	Wearable Sensors and Systems for Wound Healing-Related pH and Temperature Detection. Micromachines, 2021, 12, 430.	2.9	51
18	New starch capsules with antistatic, anti-wear and superlubricity properties. Frontiers of Materials Science, 2021, 15, 266-279.	2.2	5

#	ARTICLE	IF	CITATIONS
19	High-Performance Polyimide-Based Water-Driven Solid Triboelectric Nanogenerator for Hydropower Harvesting. ACS Applied Materials & Interfaces, 2021, 13, 32106-32114.	8.0	26
20	Multifunctional Dressing for Wound Diagnosis and Rehabilitation. Advanced Healthcare Materials, 2021, 10, e2101292.	7.6	49
21	A triboelectric/electromagnetic hybrid generator for efficient wind energy collection and power supply for electronic devices. Science China Technological Sciences, 2021, 64, 2003-2011.	4.0	19
22	Smart Materials Enabled with Artificial Intelligence for Healthcare Wearables. Advanced Functional Materials, 2021, 31, 2105482.	14.9	56
23	A new method for the electrostatic manipulation of droplet movement by triboelectric nanogenerator. Nano Energy, 2021, 86, 106115.	16.0	30
24	Stretchable and Highly Permeable Nanofibrous Sensors for Detecting Complex Human Body Motion. Advanced Materials, 2021, 33, e2102488.	21.0	35
25	Triboelectrification of interface controlled by photothermal materials based on electron transfer. Nano Energy, 2021, 89, 106336.	16.0	10
26	Stretchable and Highly Permeable Nanofibrous Sensors for Detecting Complex Human Body Motion (Adv. Mater. 41/2021). Advanced Materials, 2021, 33, 2170325.	21.0	2
27	Green plant-based triboelectricity system for green energy harvesting and contact warning. EcoMat, 2021, 3, e12145.	11.9	13
28	An asymmetric AC electric field of triboelectric nanogenerator for efficient water/oil emulsion separation. Nano Energy, 2021, 90, 106641.	16.0	34
29	Control of triboelectricity by mechanoluminescence in ZnS/Mn-containing polymer films. Nano Energy, 2021, 90, 106646.	16.0	28
30	Fully Integrated Self-Powered Electrical Stimulation Cell Culture Dish for Noncontact High-Efficiency Plasmid Transfection. ACS Applied Materials & Interfaces, 2021, 13, 54762-54769.	8.0	6
31	A flexible dual-structured MXene for ultra-sensitive and ultra-wide monitoring of anatomical and physiological movements. Journal of Materials Chemistry A, 2021, 9, 26867-26874.	10.3	14
32	Smart Materials Enabled with Artificial Intelligence for Healthcare Wearables (Adv. Funct. Mater.)	14.9	8
33	Oleic-acid enhanced triboelectric nanogenerator with high output performance and wear resistance. Nano Energy, 2020, 69, 104435.	16.0	54
34	Biofilm material based triboelectric nanogenerator with high output performance in 95% humidity environment. Nano Energy, 2020, 77, 105088.	16.0	57
35	New inorganic coating-based triboelectric nanogenerators with anti-wear and self-healing properties for efficient wave energy harvesting. Applied Materials Today, 2020, 20, 100645.	4.3	26
36	A Highly Aligned Nanowire-Based Strain Sensor for Ultrasensitive Monitoring of Subtle Human Motion. Small, 2020, 16, e2001363.	10.0	72

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37	New Self-Healing Triboelectric Nanogenerator Based on Simultaneous Repair Friction Layer and Conductive Layer. ACS Applied Materials & Interfaces, 2020, 12, 30390-30398.	8.0	53
38	New Hydrophobic Organic Coating Based Triboelectric Nanogenerator for Efficient and Stable Hydropower Harvesting. ACS Applied Materials & Interfaces, 2020, 12, 31351-31359.	8.0	53
39	Strain Sensors: A Highly Aligned Nanowire-Based Strain Sensor for Ultrasensitive Monitoring of Subtle Human Motion (Small 24/2020). Small, 2020, 16, 2070132.	10.0	3
40	New Coating TENG with Antiwear and Healing Functions for Energy Harvesting. ACS Applied Materials & Interfaces, 2020, 12, 9387-9394.	8.0	29
41	Interface-Regulated Contact Electrification for Power-Free and Highly Selective Gas Sensing. Advanced Intelligent Systems, 2019, 1, 1900066.	6.1	11
42	Disease Detection with Molecular Biomarkers: From Chemistry of Body Fluids to Nature-Inspired Chemical Sensors. Chemical Reviews, 2019, 119, 11761-11817.	47.7	269
43	Water-solid triboelectrification with self-repairable surfaces for water-flow energy harvesting. Nano Energy, 2019, 61, 454-461.	16.0	88
44	Controllable TiO <sub>2</sub> core-shell phase heterojunction for efficient photoelectrochemical water splitting under solar light. Applied Catalysis B: Environmental, 2019, 244, 519-528.	20.2	71
45	Leaves based triboelectric nanogenerator (TENG) and TENG tree for wind energy harvesting. Nano Energy, 2019, 55, 260-268.	16.0	217
46	Self-powered ammonia nanosensor based on the integration of the gas sensor and triboelectric nanogenerator. Nano Energy, 2018, 49, 31-39.	16.0	156
47	Triboelectrification based on double-layered polyaniline nanofibers for self-powered cathodic protection driven by wind. Nano Research, 2018, 11, 1873-1882.	10.4	73
48	A self-improving triboelectric nanogenerator with improved charge density and increased charge accumulation speed. Nature Communications, 2018, 9, 3773.	12.8	207
49	Nanoflower like SnO <sub>2</sub> -TiO <sub>2</sub> nanotubes composite photoelectrode for efficient photocathodic protection of 304 stainless steel. Applied Surface Science, 2018, 457, 516-521.	6.1	52
50	Investigation on the interface control and utilization of triboelectrification. Scientia Sinica Chimica, 2018, 48, 1514-1530.	0.4	0
51	A new protocol toward high output TENG with polyimide as charge storage layer. Nano Energy, 2017, 38, 467-476.	16.0	121
52	Solid-liquid triboelectrification in smart U-tube for multifunctional sensors. Nano Energy, 2017, 40, 95-106.	16.0	88
53	A Light Sensitive Nanogenerator for Self-Powered UV Detection with Two Measuring Ranges. Advanced Optical Materials, 2017, 5, 1600623.	7.3	27
54	A Transparent Antipeep Piezoelectric Nanogenerator to Harvest Tapping Energy on Screen. Small, 2016, 12, 1315-1321.	10.0	64

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55	Liquid–solid contact triboelectrification and its use in self-powered nanosensor for detecting organics in water. <i>Nano Energy</i> , 2016, 30, 321-329.	16.0	81
56	Conducting polymer PPy nanowire-based triboelectric nanogenerator and its application for self-powered electrochemical cathodic protection. <i>Chemical Science</i> , 2016, 7, 6477-6483.	7.4	94
57	Paper-based triboelectric nanogenerators and their application in self-powered anticorrosion and antifouling. <i>Journal of Materials Chemistry A</i> , 2016, 4, 18022-18030.	10.3	84
58	High output polypropylene nanowire array triboelectric nanogenerator through surface structural control and chemical modification. <i>Nano Energy</i> , 2016, 19, 48-57.	16.0	141
59	A three-dimensional integrated nanogenerator for effectively harvesting sound energy from the environment. <i>Nanoscale</i> , 2016, 8, 4938-4944.	5.6	70
60	A High-Reliability Kevlar Fiber–ZnO Nanowires Hybrid Nanogenerator and its Application on Self-Powered UV Detection. <i>Advanced Functional Materials</i> , 2015, 25, 5794-5798.	14.9	85
61	Packaged triboelectric nanogenerator with high durability for severe environments. <i>Nanoscale</i> , 2015, 7, 18049-18053.	5.6	45
62	An electrospun nanowire-based triboelectric nanogenerator and its application in a fully self-powered UV detector. <i>Nanoscale</i> , 2014, 6, 7842-7846.	5.6	209
63	Enhancing the performance of triboelectric nanogenerator through prior-charge injection and its application on self-powered anticorrosion. <i>Nano Energy</i> , 2014, 10, 37-43.	16.0	119
64	Two dimensional woven nanogenerator. <i>Nano Energy</i> , 2013, 2, 749-753.	16.0	76
65	Gas sensing properties of p-type semiconducting vanadium oxide nanotubes. <i>Applied Surface Science</i> , 2012, 258, 9554-9558.	6.1	70