Bhaskar Dudem

List of Publications by Year in Descending Order

35 papers	1,133 citations	21 h-index	33 g-index
36 ext. papers	1,453 ext. citations	9.3 avg, IF	5.22 L-index

#	Paper	IF	Citations
35	Wearable Triboelectric Nanogenerator from Waste Materials for Autonomous Information Transmission Morse Code.. *ACS Applied Materials & Interfaces*, **2022**,	9.5	7
34	High-performance and robust triboelectric nanogenerators based on optimal microstructured poly(vinyl alcohol) and poly(vinylidene fluoride) polymers for self-powered electronic applications. *Energy*, **2021**, 223, 120031	7.9	13
33	Natural silk-composite enabled versatile robust triboelectric nanogenerators for smart applications. *Nano Energy*, **2021**, 83, 105819	17.1	14
32	Improved performance of nanogenerator via synergetic piezo/triboelectric effects of lithium niobate microparticles embedded composite films. *Composites Science and Technology*, **2021**, 201, 108540	8.6	15
31	Exploring the theoretical and experimental optimization of high-performance triboelectric nanogenerators using microarchitectured silk cocoon films. *Nano Energy*, **2020**, 74, 104882	17.1	27
30	Integrated Design of Highly Porous Cellulose-Loaded Polymer-Based Triboelectric Films toward Flexible, Humidity-Resistant, and Sustainable Mechanical Energy Harvesters. *ACS Energy Letters*, **2020**, 5, 2140-2148	20.1	44
29	Piezo/triboelectric hybrid nanogenerators based on Ca-doped barium zirconate titanate embedded composite polymers for wearable electronics. *Composites Science and Technology*, **2020**, 188, 107963	8.6	29
28	Wearable Single-Electrode-Mode Triboelectric Nanogenerator via Conductive Polymer-Coated Textiles for Self-Power Electronics. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 16450-16458	8.3	56
27	Enhanced electrochemical performance via PPy encapsulated 3D flower-like bismuth molybdate nanoplates for high-performance supercapacitors. *Applied Surface Science*, **2019**, 478, 846-856	6.7	11
26	Engineering squandered cotton into eco-benign microarchitectured triboelectric films for sustainable and highly efficient mechanical energy harvesting. *Nano Energy*, **2019**, 61, 505-516	17.1	35
25	High-Efficiency and Thermally Sustainable Perovskite Solar Cells with Sandpaper-Aided Flexible Haze/Antireflective Films. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 12981-12989	8.3	6
24	Humidity Sustained Wearable Pouch-Type Triboelectric Nanogenerator for Harvesting Mechanical Energy from Human Activities. *Advanced Functional Materials*, **2019**, 29, 1807779	15.6	64
23	Wearable and durable triboelectric nanogenerators via polyaniline coated cotton textiles as a movement sensor and self-powered system. *Nano Energy*, **2019**, 55, 305-315	17.1	70
22	Acid-free approach towards the growth of vertically aligned TiO 2 nanorods as an efficient photoanode for dye-sensitized solar cells. *Materials Research Bulletin*, **2018**, 105, 202-209	5.1	9
21	Boosting Light Harvesting in Perovskite Solar Cells by Biomimetic Inverted Hemispherical Architectured Polymer Layer with High Haze Factor as an Antireflective Layer. *ACS Applied Materials & Interfaces*, **2018**, 10, 13113-13123	9.5	38
20	Triboelectric nanogenerators with gold-thin-film-coated conductive textile as floating electrode for scavenging wind energy. *Nano Research*, **2018**, 11, 101-113	10	33
19	Enhanced Performance of Microarchitectured PTFE-Based Triboelectric Nanogenerator via Simple Thermal Imprinting Lithography for Self-Powered Electronics. *ACS Applied Materials & Interfaces*, **2018**, 10, 24181-24192	9.5	40

18	Enhancing the output performance of hybrid nanogenerators based on Al-doped BaTiO3 composite films: a self-powered utility system for portable electronics. *Journal of Materials Chemistry A*, **2018**, 6, 16101-16110	13	44
17	High-Performance Flexible Piezoelectric-Assisted Triboelectric Hybrid Nanogenerator via Polydimethylsiloxane-Encapsulated Nanoflower-like ZnO Composite Films for Scavenging Energy from Daily Human Activities. *ACS Sustainable Chemistry and Engineering*, **2018**, 6, 8525-8535	8.3	46
16	Hierarchical Ag/TiO2/Si Forest-Like Nano/Micro-Architectures as Antireflective, Plasmonic Photocatalytic, and Self-Cleaning Coatings. *ACS Sustainable Chemistry and Engineering*, **2018**, 6, 1580-1591	8.3	30
15	High-performance and cost-effective triboelectric nanogenerators by sandpaper-assisted micropatterned polytetrafluoroethylene. *Energy*, **2018**, 165, 677-684	7.9	28
14	Highly-flexible piezoelectric nanogenerators with silver nanowires and barium titanate embedded composite films for mechanical energy harvesting. *Applied Energy*, **2018**, 230, 865-874	10.7	101
13	Improved light harvesting efficiency of semitransparent organic solar cells enabled by broadband/omnidirectional subwavelength antireflective architectures. *Journal of Materials Chemistry A*, **2018**, 6, 14769-14779	13	29
12	Nanopillar-array architectured PDMS-based triboelectric nanogenerator integrated with a windmill model for effective wind energy harvesting. *Nano Energy*, **2017**, 42, 269-281	17.1	93
11	Biomimetic nano/micro double-textured silicon with outstanding antireflective and super-hydrophilic surfaces for high optical performance. *RSC Advances*, **2017**, 7, 33757-33763	3.7	6
10	Hybrid Energy Cell with Hierarchical Nano/Micro-Architectured Polymer Film to Harvest Mechanical, Solar, and Wind Energies Individually/Simultaneously. *ACS Applied Materials & Interfaces*, **2016**, 8, 30165-30175	9.5	37
9	A multifunctional hierarchical nano/micro-structured silicon surface with omnidirectional antireflection and superhydrophilicity via an anodic aluminum oxide etch mask. *RSC Advances*, **2016**, 6, 3764-3773	3.7	22
8	Fabrication and optical characterization of hybrid antireflective structures with zinc oxide nanorods/micro pyramidal silicon for photovoltaic applications. *Optical Materials Express*, **2016**, 6, 4000	2.6	3
7	CH3NH3PbI3 planar perovskite solar cells with antireflection and self-cleaning function layers. *Journal of Materials Chemistry A*, **2016**, 4, 7573-7579	13	62
6	Thermal-tolerant polymers with antireflective and hydrophobic grooved subwavelength grating surfaces for high-performance optics. *RSC Advances*, **2016**, 6, 79755-79762	3.7	8
5	Hierarchical structured polymers for light-absorption enhancement of silicon-based solar power systems. *RSC Advances*, **2016**, 6, 55159-55166	3.7	10
4	Effect of calcination temperature on cobalt substituted cadmium ferrite nanoparticles. *Journal of Materials Science: Materials in Electronics*, **2015**, 26, 5078-5084	2.1	7
3	Multifunctional polymers with biomimetic compound architectures via nanoporous AAO films for efficient solar energy harvesting in dye-sensitized solar cells. *RSC Advances*, **2015**, 5, 90103-90110	3.7	14
2	Highly Transparent and Flexible Triboelectric Nanogenerators with Subwavelength-Architectured Polydimethylsiloxane by a Nanoporous Anodic Aluminum Oxide Template. *ACS Applied Materials & Interfaces*, **2015**, 7, 20520-9	9.5	73
1	Broadband and wide-angle antireflective characteristics of nanoporous anodic alumina films for silicon-based optoelectronic applications. *Applied Physics B: Lasers and Optics*, **2015**, 118, 439-447	1.9	9