Suman Kumar Si

List of Publications by Year
in descending order

24	1,228	393982	610482
papers	citations	19 h-index	24 g-index

24	24	24	1531
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Nature driven spider silk as high energy conversion efficient bio-piezoelectric nanogenerator. Nano Energy, 2018, 49, 655-666.	8.2	136
2	Fast charging self-powered wearable and flexible asymmetric supercapacitor power cell with fish swim bladder as an efficient natural bio-piezoelectric separator. Nano Energy, 2017, 40, 633-645.	8.2	89
3	Highly Rate Capable Nanoflower-like NiSe and WO₃@PPy Composite Electrode Materials toward High Energy Density Flexible All-Solid-State Asymmetric Supercapacitor. ACS Applied Electronic Materials, 2019, 1, 977-990.	2.0	86
4	A new insight towards eggshell membrane as high energy conversion efficient bio-piezoelectric energy harvester. Materials Today Energy, 2018, 9, 114-125.	2.5	82
5	An Approach To Fabricate PDMS Encapsulated All-Solid-State Advanced Asymmetric Supercapacitor Device with Vertically Aligned Hierarchical Znâ€“Feâ€“Co Ternary Oxide Nanowire and Nitrogen Doped Graphene Nanosheet for High Power Device Applications. ACS Applied Materials & Interfaces, 2017, 9, 5947-5958.	4.0	81
6	Fabrication of an advanced asymmetric supercapacitor based on a microcubical PB@MnO₂hybrid and PANI/GNP composite with excellent electrochemical behaviour. Journal of Materials Chemistry A, 2017, 5, 22242-22254.	5.2	75
7	A strategy to develop an efficient piezoelectric nanogenerator through ZTO assisted Î³-phase nucleation of PVDF in ZTO/PVDF nanocomposite for harvesting bio-mechanical energy and energy storage application. Materials Chemistry and Physics, 2018, 213, 525-537.	2.0	71
8	A strategy to develop highly efficient TENGs through the dielectric constant, internal resistance optimization, and surface modification. Journal of Materials Chemistry A, 2019, 7, 3979-3991.	5.2	70
9	An approach to widen the electromagnetic shielding efficiency in PDMS/ferrous ferric oxide decorated RGOâ€“SWCNH composite through pressure induced tunability. Chemical Engineering Journal, 2018, 335, 501-509.	6.6	67
10	Fabrication of an Advanced Asymmetric Supercapacitor Based on Three-Dimensional Copperâ€“Nickelâ€“Ceriumâ€“Cobalt Quaternary Oxide and GNP for Energy Storage Application. ACS Applied Electronic Materials, 2019, 1, 189-197.	2.0	66
11	Triboelectric Nanogenerator Driven Self-Charging and Self-Healing Flexible Asymmetric Supercapacitor Power Cell for Direct Power Generation. ACS Applied Materials & Interfaces, 2019, 11, 5022-5036.	4.0	63
12	High performance advanced asymmetric supercapacitor based on ultrathin and mesoporous MnCo2O4.5-NiCo2O4 hybrid and iron oxide decorated reduced graphene oxide electrode materials. Electrochimica Acta, 2018, 283, 438-447.	2.6	47
13	Morphological interference of two different cobalt oxides derived from a hydrothermal protocol and a single two-dimensional metal organic framework precursor to stabilize the Î²-phase of PVDF for flexible piezoelectric nanogenerators. Nanoscale, 2019, 11, 22989-22999.	2.8	47
14	In situ-grown organo-lead bromide perovskite-induced electroactive Î³-phase in aerogel PVDF films: an efficient photoactive material for piezoelectric energy harvesting and photodetector applications. Nanoscale, 2020, 12, 7214-7230.	2.8	44
15	Temperature dependent substrate-free facile synthesis for hierarchical sunflower-like nickelâ€“copper carbonate hydroxide with superior electrochemical performance for solid state asymmetric supercapacitor. Chemical Engineering Journal, 2018, 343, 44-53.	6.6	38
16	A polypyrrole-adorned, self-supported, pseudocapacitive zinc vanadium oxide nanoflower and nitrogen-doped reduced graphene oxide-based asymmetric supercapacitor device for power density applications. New Journal of Chemistry, 2020, 44, 1063-1075.	1.4	35
17	A Quasi-Solid-State Asymmetric Supercapacitor Device Based on Honeycomb-like Nickelâ€“Copperâ€“Carbonateâ€“Hydroxide as a Positive and Iron Oxide as a Negative Electrode with Superior Electrochemical Performances. ACS Applied Electronic Materials, 2020, 2, 177-185.	2.0	34
18	Insight into Cigarette Wrapper and Electroactive Polymer Based Efficient TENG as Biomechanical Energy Harvester for Smart Electronic Applications. ACS Applied Energy Materials, 2018, 1, 4963-4975.	2.5	26

#	Article	IF	Citations
19	Approach for Enhancement in Output Performance of Randomly Oriented ZnSnO₃ Nanorod-Based Piezoelectric Nanogenerator via pâ€“n Heterojunction and Surface Passivation Layer. ACS Applied Electronic Materials, 2020, 2, 2565-2578.	2.0	22
20	Photovoltaic and triboelectrification empowered light-weight flexible self-charging asymmetric supercapacitor cell for self-powered multifunctional electronics. Renewable and Sustainable Energy Reviews, 2021, 151, 111595.	8.2	20
21	Nanostructured cigarette wrapper encapsulated <scp>PDMSâ€RGO</scp> sandwiched composite for high performance <scp>EMI</scp> shielding applications. Polymer Engineering and Science, 2020, 60, 3056-3071.	1.5	15
22	High performance alkaline battery-supercapacitor hybrid device based on diffusion driven double shelled CoSn(OH)6 nanocube@âˆ•Ni(OH)2 core-shell nanoflower. Journal of Energy Storage, 2021, 43, 103206.	3.9	5
23	Fabrication of a flexible quasi-solid-state asymmetric supercapacitor device based on a spherical honeycomb like ZnMn2O4@Ni(OH)2 hybrid core-shell electrode material with superior electrochemical performances. Results in Chemistry, 2022, 4, 100404.	0.9	5
24	Comparative supercapacitive analysis of 2-methylimidazole derived cobalt nickel oxides (CoNiO2 and) Tj ETQq0 0 0 rgBT /Overlock 10 Tf Storage, 2022, 52, 104993.	3.9	4