Zhongyang Wang

List of Publications by Year in descending order

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		172457	189892
50	2,970	29	50
papers	citations	h-index	g-index
52	52	52	2214
32	32	32	2217
all docs	docs citations	times ranked	citing authors

#	Article	IF	CITATIONS
1	Flexible polydimethylsiloxane/multi-walled carbon nanotubes membranous metacomposites with negative permittivity. Polymer, 2017, 125, 50-57.	3.8	379
2	Tunable and weakly negative permittivity in carbon/silicon nitride composites with different carbonizing temperatures. Carbon, 2017, 125, 103-112.	10.3	199
3	Tunable Negative Permittivity in Flexible Graphene/PDMS Metacomposites. Journal of Physical Chemistry C, 2019, 123, 23635-23642.	3.1	178
4	Potential-Dependent Phase Transition and Mo-Enriched Surface Reconstruction of \hat{I}^3 -CoOOH in a Heterostructured Co-Mo ₂ C Precatalyst Enable Water Oxidation. ACS Catalysis, 2020, 10, 4411-4419.	11.2	174
5	An overview of metamaterials and their achievements in wireless power transfer. Journal of Materials Chemistry C, 2018, 6, 2925-2943.	5.5	166
6	Design and analysis of negative permittivity behaviors in barium titanate/nickel metacomposites. Acta Materialia, 2020, 185, 412-419.	7.9	154
7	Silica microsphere templated self-assembly of a three-dimensional carbon network with stable radio-frequency negative permittivity and low dielectric loss. Journal of Materials Chemistry C, 2018, 6, 5239-5249.	5. 5	143
8	Targeted Double Negative Properties in Silver/Silica Random Metamaterials by Precise Control of Microstructures. Research, 2019, 2019, 1021368.	5.7	118
9	Dielectric dispersion of copper/rutile cermets: Dielectric resonance, relaxation, and plasma oscillation. Scripta Materialia, 2021, 190, 1-6.	5.2	107
10	Doped ceramics of indium oxides for negative permittivity materials in MHz-kHz frequency regions. Journal of Materials Science and Technology, 2021, 61, 125-131.	10.7	106
11	Flexible silver nanowire/carbon fiber felt metacomposites with weakly negative permittivity behavior. Physical Chemistry Chemical Physics, 2020, 22, 5114-5122.	2.8	103
12	Permittivity transition from positive to negative in acrylic polyurethane-aluminum composites. Composites Science and Technology, 2020, 188, 107969.	7.8	78
13	Regulation mechanism of negative permittivity in percolating composites via building blocks. Applied Physics Letters, 2017, 111, .	3.3	72
14	Negative permittivity adjusted by SiO2-coated metallic particles in percolative composites. Journal of Alloys and Compounds, 2017, 725, 1259-1263.	5.5	64
15	Negative permittivity derived from inductive characteristic in the percolating Cu/EP metacomposites. Journal of Materials Science and Technology, 2019, 35, 2463-2469.	10.7	59
16	Hydrosoluble Graphene/Polyvinyl Alcohol Membranous Composites with Negative Permittivity Behavior. Macromolecular Materials and Engineering, 2020, 305, 1900709.	3.6	59
17	Epsilon-negative BaTiO3/Cu composites with high thermal conductivity and yet low electrical conductivity. Journal of Materiomics, 2020, 6, 145-151.	5.7	58
18	Paper-based metasurface: Turning waste-paper into a solution for electromagnetic pollution. Journal of Cleaner Production, 2019, 234, 588-596.	9.3	51

#	Article	IF	CITATIONS
19	Low percolation threshold in flexible graphene/acrylic polyurethane composites with tunable negative permittivity. Composites Science and Technology, 2017, 151, 79-84.	7.8	47
20	Doping-dependent negative dielectric permittivity realized in mono-phase antimony tin oxide ceramics. Journal of Materials Chemistry C, 2020, 8, 11610-11617.	5 . 5	43
21	Radioâ€frequency negative permittivity in the graphene/silicon nitride composites prepared by spark plasma sintering. Journal of the American Ceramic Society, 2018, 101, 1598-1606.	3.8	40
22	Weakly negative permittivity and low frequency dispersive behavior in graphene/epoxy metacomposites. Journal of Materials Science: Materials in Electronics, 2019, 30, 14745-14754.	2.2	40
23	Low-loss and temperature-stable negative permittivity in La0.5Sr0.5MnO3 ceramics. Journal of the European Ceramic Society, 2020, 40, 1917-1921.	5.7	38
24	Defect-induced insulator-metal transition and negative permittivity in La1-Ba CoO3 perovskite structure. Journal of Materials Science and Technology, 2022, 112, 77-84.	10.7	38
25	Ultraweakly and fine-tunable negative permittivity of polyaniline/nickel metacomposites with high-frequency diamagnetic response. Composites Science and Technology, 2022, 217, 109092.	7.8	35
26	Synergistic Effects of Carbon Nanotubes on Negative Dielectric Properties of Graphene-Phenolic Resin Composites. Journal of Physical Chemistry C, 2017, 121, 12037-12045.	3.1	33
27	Radio-frequency epsilon-negative property and diamagnetic response of percolative Ag/CCTO metacomposites. Scripta Materialia, 2021, 203, 114067.	5.2	33
28	Negative dielectric permittivity and high-frequency diamagnetic responses of percolated nickel/rutile cermets. Composites Part A: Applied Science and Manufacturing, 2020, 139, 106132.	7.6	32
29	Generation mechanism of negative permittivity and Kramers–Kronig relations in BaTiO ₃ /Y ₃ Fe ₅ O ₁₂ multiferroic composites. Journal of Physics Condensed Matter, 2017, 29, 365703.	1.8	31
30	Targeted Double Negative Properties in Silver/Silica Random Metamaterials by Precise Control of Microstructures. Research, 2019, 2019, 1-11.	5.7	30
31	Epsilon-negative behavior of BaTiO3/Ag metacomposites prepared by an in situ synthesis. Ceramics International, 2020, 46, 9342-9346.	4.8	28
32	Negative-k and positive-k layers introduced into graphene/polyvinylidene fluoride composites to achieve high-k and low loss. Materials and Design, 2021, 209, 110009.	7.0	27
33	Direct Observation of Stable Negative Capacitance in SrTiO ₃ @BaTiO ₃ Heterostructure. Advanced Electronic Materials, 2020, 6, 1901005.	5.1	26
34	Compressible sliver nanowires/polyurethane sponge metacomposites with weakly negative permittivity controlled by elastic deformation. Journal of Materials Science, 2020, 55, 15481-15492.	3.7	25
35	Epsilon-negative media from the viewpoint of materials science. EPJ Applied Metamaterials, 2021, 8, 11.	1.5	23
36	Low-frequency plasmonic state and negative permittivity in copper/titanium dioxide percolating composites. Ceramics International, 2021, 47, 2208-2213.	4.8	22

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#	Article	IF	Citations
37	Regulation mechanism of negative permittivity in poly (p-phenylene sulfide)/multiwall carbon nanotubes composites. Synthetic Metals, 2018, 244, 15-19.	3.9	17
38	Metacomposites: functional design via titanium nitride/nickel(II) oxide composites towards tailorable negative dielectric properties at radio-frequency range. Journal of Materials Science: Materials in Electronics, 2018, 29, 5853-5861.	2.2	16
39	Percolated cermets of nickel/yttrium iron garnet for double negative metacomposites. Composites Communications, 2021, 24, 100667.	6.3	16
40	Epsilon-negative behavior and its capacitance enhancement effect on trilayer-structured polyimide–silica/multiwalled carbon nanotubes/polyimide–polyimide composites. Journal of Materials Chemistry C, 2022, 10, 4286-4294.	5 . 5	12
41	Negative permittivity behavior of titanium nitride/polyphenylene sulfide "metacomposites―under radio frequency. Journal of Materials Science: Materials in Electronics, 2018, 29, 12144-12151.	2.2	9
42	MnO2 as an effective sintering aid for difficult-to-sinter LiTaO3-based ceramics: Densification and dielectric properties. Journal of Alloys and Compounds, 2020, 829, 154546.	5 . 5	9
43	Flexible acrylic-polyurethane/copper composites with a frequency and temperature-independent permittivity. Journal of Materials Science: Materials in Electronics, 2018, 29, 20832-20839.	2.2	7
44	Synergistic effect of dielectric resonance and plasma oscillation on negative permittivity behavior in La1-Sr MnO3 single-phase ceramic. Ceramics International, 2022, 48, 8417-8422.	4.8	7
45	Iron Granular Percolative Composites toward Radio-Frequency Negative Permittivity. ECS Journal of Solid State Science and Technology, 2018, 7, N132-N136.	1.8	4
46	Carbon fiber skeleton/silver nanowires composites with tunable negative permittivity behavior. EPJ Applied Metamaterials, 2021, 8, 1.	1.5	3
47	Communication—Modulation Mechanism of Epsilon-Negative and Epsilon-Near-Zero Behavior in Carbon Nanotube-Carbon Black/Copper Calcium Titanate Ternary Metacomposites. ECS Journal of Solid State Science and Technology, 2021, 10, 023007.	1.8	3
48	MWCNTs/BaTiO3 metacomposite with negative permittivity behavior and electric percolation phenomenon in radio frequency. Journal of Materials Science: Materials in Electronics, 2019, 30, 10138-10144.	2.2	1
49	Design of three-dimensional isotropic negative-refractive-index metamaterials with wideband response based on an effective-medium approach. Applied Physics A: Materials Science and Processing, 2022, 128, 1.	2.3	1
50	Negative permittivity behavior in silver nanowire-assisted polyaniline metacomposites induced by the low-frequency plasmonic oscillation. Journal of Materials Science: Materials in Electronics, 2021, 32, 26851-26856.	2.2	0