Thomas Gkourmpis

List of Publications by Year
in descending order

31 papers	577 citations	623734 14 h-index	610901 24 g-index
31 all docs	31 docs citations	31 times ranked	620 citing authors

#	Article	IF	Citations
1	Modelling tie chains and trapped entanglements in polyethylene. Polymer, 2012, 53, 3594-3601.	3.8	72
2	Highly Insulating Polyethylene Blends for High-Voltage Direct-Current Power Cables. ACS Macro Letters, 2017, 6, 78-82.	4.8	68
3	Molecular dynamics simulation of linear polyethylene blends: Effect of molar mass bimodality on topological characteristics and mechanical behavior. Polymer, 2019, 161, 139-150.	3.8	50
4	Molecular Dynamics Simulations of Short-Chain Branched Bimodal Polyethylene: Topological Characteristics and Mechanical Behavior. Macromolecules, 2019, 52, 807-818.	4.8	42
5	Effect of carbon black on electrical and rheological properties of graphite nanoplatelets/poly(ethylene-butyl acrylate) composites. EXPRESS Polymer Letters, 2015, 9, 66-76.	2.1	41
6	Simulation of semi-crystalline polyethylene: Effect of short-chain branching on tie chains and trapped entanglements. Polymer, 2015, 72, 177-184.	3.8	39
7	Recyclable Polyethylene Insulation via Reactive Compounding with a Maleic Anhydride-Grafted Polypropylene. ACS Applied Polymer Materials, 2020, 2, 2389-2396.	4.4	34
8	Byproduct-free curing of a highly insulating polyethylene copolymer blend: an alternative to peroxide crosslinking. Journal of Materials Chemistry C, 2018, 6, 11292-11302.	5.5	26
9	Additiveâ€like amounts of HDPE prevent creep of molten LDPE: Phaseâ€behavior and thermoâ€mechanical properties of a meltâ€miscible blend. Journal of Polymer Science, Part B: Polymer Physics, 2017, 55, 146-156.	2.1	24
10	Nanocomposites and polyethylene blends: two potentially synergistic strategies for HVDC insulation materials with ultra-low electrical conductivity. Composites Part B: Engineering, 2021, 204, 108498.	12.0	24
11	Melt-Mixed 3D Hierarchical Graphene/Polypropylene Nanocomposites with Low Electrical Percolation Threshold. Nanomaterials, 2019, 9, 1766.	4.1	23
12	Click chemistryâ€type crosslinking of a lowâ€conductivity polyethylene copolymer ternary blend for power cable insulation. Polymer International, 2020, 69, 404-412.	3.1	16
13	Three Dimensional Picture of the Local Structure of 1,4-Polybutadiene from a Complete Atomistic Model and Neutron Scattering Data. Macromolecules, 2011, 44, 3140-3148.	4.8	14
14	Mechanical Behavior of Melt-Mixed 3D Hierarchical Graphene/Polypropylene Nanocomposites. Polymers, 2020, 12, 1309.	4.5	14
15	A molecular-level computational study of the diffusion and solubility of water and oxygen in carbonaceous polyethylene nanocomposites. Journal of Polymer Science, Part B: Polymer Physics, 2016, 54, 589-602.	2.1	10
16	Highâ€temperature creep resistant ternary blends based on polyethylene and polypropylene for thermoplastic power cable insulation. Journal of Polymer Science, 2021, 59, 1084-1094.	3.8	10
17	Nonlinear â€œodditiesâ€•at the percolation of 3D hierarchical graphene polymer nanocomposites. Rheologica Acta, 2020, 59, 333-347.	2.4	10
18	Highly insulating thermoplastic blends comprising a styrenic copolymer for directâ€current power cable insulation. High Voltage, 2022, 7, 251-259.	4.7	10

#	Article	IF	Citations
19	Improved electrical and flow properties of conductive polyolefin blends: Modification of poly(ethylene vinyl acetate) copolymer/carbon black with ethyleneâ€“propylene copolymer. European Polymer Journal, 2013, 49, 1975-1983.	5.4	9
20	Invariant dielectric strength upon addition of low amounts of HDPE to LDPE. , 2016, , .		6
21	Influence of Molecular Weight on the Creep Resistance of Almost Molten Polyethylene Blends. Macromolecular Chemistry and Physics, 2018, 219, 1700072.	2.2	6
22	Highly insulating thermoplastic nanocomposites based on a polyolefin ternary blend for high-voltage direct current power cables. Nanoscale, 2022, 14, 7927-7933.	5.6	6
23	Electrically Conductive Polymer Nanocomposites. , 2016, , 209-236.		5
24	CARBON-BASED HIGH ASPECT RATIO POLYMER NANOCOMPOSITES. , 2013, , 85-123.		4
25	SANS/WANS Time-resolving Neutron Scattering Studiesof Polymer Phase Transitions Using NIMROD. Materials Research Society Symposia Proceedings, 2013, 1528, 1.	0.1	3
26	Controlling and Evaluating the Structure and Morphology of Polymers on Multiple Scales. Journal of Materials Science and Chemical Engineering, 2015, 03, 48-60.	0.4	3
27	Multiscale modeling of polymers closely coupled to Broad Q neutron scattering from NIMROD. Materials Research Society Symposia Proceedings, 2013, 1524, 1001.	0.1	2
28	Experimentally driven atomistic model of 1,2 polybutadiene. Journal of Applied Physics, 2014, 115, 053505.	2.5	2
29	New Tools for Understanding Complex Polymer Behaviour. Procedia Manufacturing, 2017, 12, 280-290.	1.9	2
30	The Use of Scattering Data in the Study of the Molecular Organisation of Polymers in the Non-Crystalline State. Polymers, 2020, 12, 2917.	4.5	2
31	Numerical Thermal Analysis of a T Jump System Used for Studying Polymer Behaviour. Applied Mechanics and Materials, 0, 890, 155-161.	0.2	0