Pingan Song

List of Publications by Citations

164 papers	7,829 citations	55 h-index	83 g-index
175 ext. papers	11,096 ext. citations	9.1 avg, IF	6.87 L-index

#	Paper	IF	Citations
164	Fabrication of exfoliated graphene-based polypropylene nanocomposites with enhanced mechanical and thermal properties. *Polymer*, **2011**, 52, 4001-4010	3.9	480
163	Improved flame resistance and thermo-mechanical properties of epoxy resin nanocomposites from functionalized graphene oxide via self-assembly in water. *Composites Part B: Engineering*, **2019**, 165, 406-416	10	219
162	Fabrication of Green Lignin-based Flame Retardants for Enhancing the Thermal and Fire Retardancy Properties of Polypropylene/Wood Composites. *ACS Sustainable Chemistry and Engineering*, **2016**, 4, 2422-2431	8.3	180
161	Flame retardant polymeric nanocomposites through the combination of nanomaterials and conventional flame retardants. *Progress in Materials Science*, **2020**, 114, 100687	42.2	179
160	A liquid phosphorus-containing imidazole derivative as flame-retardant curing agent for epoxy resin with enhanced thermal latency, mechanical, and flame-retardant performances. *Journal of Hazardous Materials*, **2020**, 386, 121984	12.8	155
159	Combination effect of carbon nanotubes with graphene on intumescent flame-retardant polypropylene nanocomposites. *Composites Part A: Applied Science and Manufacturing*, **2014**, 59, 18-25	8.4	142
158	Strengthening, toughing and thermally stable ultra-thin MXene nanosheets/polypropylene nanocomposites via nanoconfinement. *Chemical Engineering Journal*, **2019**, 378, 122267	14.7	140
157	Super-tough artificial nacre based on graphene oxide via synergistic interface interactions of □□ stacking and hydrogen bonding. *Carbon*, **2017**, 111, 807-812	10.4	139
156	Flame-retardant-wrapped carbon nanotubes for simultaneously improving the flame retardancy and mechanical properties of polypropylene. *Journal of Materials Chemistry*, **2008**, 18, 5083		136
155	Phosphorus-containing flame retardant epoxy thermosets: Recent advances and future perspectives. *Progress in Polymer Science*, **2021**, 114, 101366	29.6	129
154	Interface engineering of MXene towards super-tough and strong polymer nanocomposites with high ductility and excellent fire safety. *Chemical Engineering Journal*, **2020**, 399, 125829	14.7	128
153	Bioinspired Strategy to Reinforce PVA with Improved Toughness and Thermal Properties via Hydrogen-Bond Self-Assembly. *ACS Macro Letters*, **2013**, 2, 1100-1104	6.6	127
152	High-Performance Polymeric Materials through Hydrogen-Bond Cross-Linking. *Advanced Materials*, **2020**, 32, e1901244	24	121
151	Lignin-derived bio-based flame retardants toward high-performance sustainable polymeric materials. *Green Chemistry*, **2020**, 22, 2129-2161	10	113
150	Polyphosphoramide-intercalated MXene for simultaneously enhancing thermal stability, flame retardancy and mechanical properties of polylactide. *Chemical Engineering Journal*, **2020**, 397, 125336	14.7	112
149	Cation and anion Co-doping synergy to improve structural stability of Li- and Mn-rich layered cathode materials for lithium-ion batteries. *Nano Energy*, **2019**, 57, 157-165	17.1	108
148	Bioinspired Design of Strong, Tough, and Thermally Stable Polymeric Materials via Nanoconfinement. *ACS Nano*, **2018**, 12, 9266-9278	16.7	108

147	Green and Scalable Fabrication of Core–Shell Biobased Flame Retardants for Reducing Flammability of Polylactic Acid. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 8954-8963	8.3	106
146	Granular Nanostructure: A Facile Biomimetic Strategy for the Design of Supertough Polymeric Materials with High Ductility and Strength. *Advanced Materials*, **2017**, 29, 1704661	24	105
145	Fire-Resistant, Strong, and Green Polymer Nanocomposites Based on Poly(lactic acid) and Core–Shell Nanofibrous Flame Retardants. *ACS Sustainable Chemistry and Engineering*, **2017**, 5, 7894-7904	8.3	105
144	Surface-coating engineering for flame retardant flexible polyurethane foams: A critical review. *Composites Part B: Engineering*, **2019**, 176, 107185	10	103
143	A lignin-based nano-adsorbent for superfast and highly selective removal of phosphate. *Journal of Materials Chemistry A*, **2018**, 6, 9971-9983	13	98
142	Converting Industrial Alkali Lignin to Biobased Functional Additives for Improving Fire Behavior and Smoke Suppression of Polybutylene Succinate. *ACS Sustainable Chemistry and Engineering*, **2016**, 4, 4732-4742	8.3	97
141	Combination effects of graphene and layered double hydroxides on intumescent flame-retardant poly(methyl methacrylate) nanocomposites. *Applied Clay Science*, **2014**, 88-89, 78-85	5.2	92
140	A bio-based ionic complex with different oxidation states of phosphorus for reducing flammability and smoke release of epoxy resins. *Composites Communications*, **2020**, 17, 104-108	6.7	92
139	Fabrication of dendrimer-like fullerene (C60)-decorated oligomeric intumescent flame retardant for reducing the thermal oxidation and flammability of polypropylene nanocomposites. *Journal of Materials Chemistry*, **2009**, 19, 1305		91
138	Lightweight, Superelastic Yet Thermoconductive Boron Nitride Nanocomposite Aerogel for Thermal Energy Regulation. *ACS Nano*, **2019**, 13, 7860-7870	16.7	90
137	Thermal degradation and flame retardancy properties of ABS/lignin: Effects of lignin content and reactive compatibilization. *Thermochimica Acta*, **2011**, 518, 59-65	2.9	89
136	Bio-Inspired Hydrogen-Bond Cross-Link Strategy toward Strong and Tough Polymeric Materials. *Macromolecules*, **2015**, 48, 3957-3964	5.5	86
135	Synthesis of decorated graphene with P, N-containing compounds and its flame retardancy and smoke suppression effects on polylactic acid. *Composites Part B: Engineering*, **2019**, 170, 41-50	10	84
134	Realizing simultaneous improvements in mechanical strength, flame retardancy and smoke suppression of ABS nanocomposites from multifunctional graphene. *Composites Part B: Engineering* , **2019**, 177, 107377	10	83
133	A facile way to prepare phosphorus-nitrogen-functionalized graphene oxide for enhancing the flame retardancy of epoxy resin. *Composites Communications*, **2018**, 10, 97-102	6.7	83
132	Engineering MXene surface with POSS for reducing fire hazards of polystyrene with enhanced thermal stability. *Journal of Hazardous Materials*, **2021**, 401, 123342	12.8	83
131	Water-based hybrid coatings toward mechanically flexible, super-hydrophobic and flame-retardant polyurethane foam nanocomposites with high-efficiency and reliable fire alarm response. *Composites Part B: Engineering*, **2020**, 193, 108017	10	80
130	Fabrication of multifunctional graphene decorated with bromine and nano-Sb2O3 towards high-performance polymer nanocomposites. *Carbon*, **2016**, 98, 689-701	10.4	79

129	Core–Shell Bioderived Flame Retardants Based on Chitosan/Alginate Coated Ammonia Polyphosphate for Enhancing Flame Retardancy of Polylactic Acid. *ACS Sustainable Chemistry and Engineering*, **2020**, 8, 6402-6412	8.3	78
128	Bioinspired, Highly Adhesive, Nanostructured Polymeric Coatings for Superhydrophobic Fire-Extinguishing Thermal Insulation Foam. *ACS Nano*, **2021**,	16.7	75
127	Mechanically Robust, Flame-Retardant Poly(lactic acid) Biocomposites via Combining Cellulose Nanofibers and Ammonium Polyphosphate. *ACS Omega*, **2018**, 3, 5615-5626	3.9	74
126	Permeability, Viscoelasticity, and Flammability Performances and Their Relationship to Polymer Nanocomposites. *Industrial & Engineering Chemistry Research*, **2012**, 51, 7255-7263	3.9	72
125	Effects of metal chelates on a novel oligomeric intumescent flame retardant system for polypropylene. *Journal of Analytical and Applied Pyrolysis*, **2008**, 82, 286-291	6	72
124	Polypropylene nanocomposites based on C60-decorated carbon nanotubes: thermal properties, flammability, and mechanical properties. *Journal of Materials Chemistry*, **2011**, 21, 7782		69
123	A highly fire-safe and smoke-suppressive single-component epoxy resin with switchable curing temperature and rapid curing rate. *Composites Part B: Engineering*, **2021**, 207, 108601	10	69
122	Synthesis of a novel oligomeric intumescent flame retardant and its application in polypropylene. *Polymer Engineering and Science*, **2009**, 49, 1326-1331	2.3	67
121	Lignin-Derived Porous Carbon Loaded with La(OH)3 Nanorods for Highly Efficient Removal of Phosphate. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 758-768	8.3	66
120	2D-alumina platelets enhance mechanical and abrasion properties of PA612 via interfacial hydrogen-bond interactions. *Chemical Engineering Journal*, **2017**, 308, 760-771	14.7	65
119	Flame retardant mechanism of organo-bentonite in polypropylene. *Applied Clay Science*, **2009**, 45, 178-184	5.2	65
118	Functionalizing graphene decorated with phosphorus-nitrogen containing dendrimer for high-performance polymer nanocomposites. *Composites Part A: Applied Science and Manufacturing*, **2016**, 86, 9-18	8.4	64
117	Epoxy nanocomposites simultaneously strengthened and toughened by hybridization with graphene oxide and block ionomer. *Composites Science and Technology*, **2018**, 168, 363-370	8.6	64
116	Flame retardant and mechanically tough poly(lactic acid) biocomposites via combining ammonia polyphosphate and polyethylene glycol. *Composites Communications*, **2017**, 6, 1-5	6.7	63
115	Bioinspired strategy for tuning thermal stability of PVA via hydrogen-bond crosslink. *Composites Science and Technology*, **2015**, 118, 16-22	8.6	62
114	Striking multiple synergies created by combining reduced graphene oxides and carbon nanotubes for polymer nanocomposites. *Nanotechnology*, **2013**, 24, 125704	3.4	62
113	Effects of reactive compatibilization on the morphological, thermal, mechanical, and rheological properties of intumescent flame-retardant polypropylene. *ACS Applied Materials & Interfaces*, **2009**, 1, 452-9	9.5	62
112	Fabrication of fullerene-decorated carbon nanotubes and their application in flame-retarding polypropylene. *Nanoscale*, **2009**, 1, 118-21	7.7	60

111	A molecularly engineered bioderived polyphosphate for enhanced flame retardant, UV-blocking and mechanical properties of poly(lactic acid). *Chemical Engineering Journal*, **2021**, 411, 128493	14.7	56
110	Flame retarded polymer nanocomposites: Development, trend and future perspective. *Science China Chemistry*, **2011**, 54, 302-313	7.9	55
109	Effects of carbon nanotubes and its functionalization on the thermal and flammability properties of polypropylene/wood flour composites. *Journal of Materials Science*, **2010**, 45, 3520-3528	4.3	55
108	Thermal degradation and flame retardancy of polypropylene/C60 nanocomposites. *Thermochimica Acta*, **2008**, 473, 106-108	2.9	54
107	Transparent, highly thermostable and flame retardant polycarbonate enabled by rod-like phosphorous-containing metal complex aggregates. *Chemical Engineering Journal*, **2021**, 409, 128223	14.7	54
106	Largely enhanced thermal and mechanical properties of polymer nanocomposites via incorporating C60@graphene nanocarbon hybrid. *Nanotechnology*, **2013**, 24, 505706	3.4	52
105	Toward Fully Bio-based and Supertough PLA Blends via in Situ Formation of Cross-Linked Biopolyamide Continuity Network. *Macromolecules*, **2019**, 52, 8415-8429	5.5	51
104	Grafting Lignin with Bioderived Polyacrylates for Low-Cost, Ductile, and Fully Biobased Poly(lactic acid) Composites. *ACS Sustainable Chemistry and Engineering*, **2020**, 8, 2267-2276	8.3	51
103	One-pot scalable fabrication of an oligomeric phosphoramide towards high-performance flame retardant polylactic acid with a submicron-grained structure. *Composites Part B: Engineering*, **2020**, 183, 107695	10	51
102	Manipulating interphase reactions for mechanically robust, flame-retardant and sustainable polylactide biocomposites. *Composites Part B: Engineering*, **2020**, 190, 107930	10	47
101	Enhanced mechanical property and flame resistance of graphene oxide nanocomposite paper modified with functionalized silica nanoparticles. *Composites Part B: Engineering*, **2019**, 177, 107347	10	46
100	Design of orderly carbon coatings for SiO anodes promoted by TiO2 toward high performance lithium-ion battery. *Chemical Engineering Journal*, **2018**, 338, 488-495	14.7	46
99	Multifunctional graphene-based nano-additives toward high-performance polymer nanocomposites with enhanced mechanical, thermal, flame retardancy and smoke suppressive properties. *Chemical Engineering Journal*, **2021**, 410, 127590	14.7	46
98	A Liquid Phosphaphenanthrene-Derived Imidazole for Improved Flame Retardancy and Smoke Suppression of Epoxy Resin. *ACS Applied Polymer Materials*, **2020**, 2, 3566-3575	4.3	43
97	Functionalizing MXene towards highly stretchable, ultratough, fatigue- and fire-resistant polymer nanocomposites. *Chemical Engineering Journal*, **2021**, 424, 130338	14.7	43
96	Morphological structure and mechanical properties of epoxy/polysulfone/cellulose nanofiber ternary nanocomposites. *Composites Science and Technology*, **2015**, 115, 66-71	8.6	42
95	Graft Polymerization of Acrylic Monomers onto Lignin with CaCl2–H2O2 as Initiator: Preparation, Mechanism, Characterization, and Application in Poly(lactic acid). *ACS Sustainable Chemistry and Engineering*, **2018**, 6, 337-348	8.3	41
94	Coralloid-like Nanostructured c-nSi/SiO@C Anodes for High Performance Lithium Ion Battery. *ACS Applied Materials & Interfaces*, **2017**, 9, 28464-28472	9.5	41

93	Catalytic Effects of Nickel (Cobalt or Zinc) Acetates on Thermal and Flammability Properties of Polypropylene-Modified Lignin Composites. *Industrial & Engineering Chemistry Research*, **2012**, 51, 12367-12374	3.9	40
92	Morphology, healing and mechanical performance of nanofibrillated cellulose reinforced poly(ε-caprolactone)/epoxy composites. *Composites Science and Technology*, **2016**, 125, 62-70	8.6	39
91	A novel zinc chelate complex containing both phosphorus and nitrogen for improving the flame retardancy of low density polyethylene. *Journal of Analytical and Applied Pyrolysis*, **2011**, 92, 339-346	6	38
90	Thermally stable, conductive and flame-retardant nylon 612 composites created by adding two-dimensional alumina platelets. *Composites Part A: Applied Science and Manufacturing*, **2017**, 97, 100-110	8.4	36
89	One-step and green synthesis of lightweight, mechanically flexible and flame-retardant polydimethylsiloxane foam nanocomposites via surface-assembling ultralow content of graphene derivative. *Chemical Engineering Journal*, **2020**, 393, 124724	14.7	36
88	Polylactide/hemp hurd biocomposites as sustainable 3D printing feedstock. *Composites Science and Technology*, **2019**, 184, 107887	8.6	36
87	Molecularly Engineered Lignin-Derived Additives Enable Fire-Retardant, UV-Shielding, and Mechanically Strong Polylactide Biocomposites. *Biomacromolecules*, **2021**, 22, 1432-1444	6.9	35
86	Thermal degradation and flammability properties of HDPE/EVA/C60 nanocomposites. *Thermochimica Acta*, **2010**, 506, 98-101	2.9	33
85	A facile method to improve thermal stability and flame retardancy of polyamide 6. *Composites Communications*, **2019**, 13, 143-150	6.7	31
84	Effect of Lignin Incorporation and Reactive Compatibilization on the Morphological, Rheological, and Mechanical Properties of ABS Resin. *Journal of Macromolecular Science - Physics*, **2012**, 51, 720-735	1.4	31
83	One-Pot, Solvent- and Catalyst-Free Synthesis of Polyphosphoramide as an Eco-Benign and Effective Flame Retardant for Poly(lactic acid). *ACS Sustainable Chemistry and Engineering*, **2020**, 8, 16612-16623	8.3	31
82	Lightweight high-performance carbon-polymer nanocomposites for electromagnetic interference shielding. *Composites Part A: Applied Science and Manufacturing*, **2021**, 145, 106376	8.4	30
81	Facile and green fabrication of flame-retardant Ti3C2Tx MXene networks for ultrafast, reusable and weather-resistant fire warning. *Chemical Engineering Journal*, **2022**, 427, 131615	14.7	30
80	Facile fabrication of HDPE-g-MA/nanodiamond nanocomposites via one-step reactive blending. *Nanoscale Research Letters*, **2012**, 7, 355	5	28
79	Flame-retardant, transparent, mechanically-strong and tough epoxy resin enabled by high-efficiency multifunctional boron-based polyphosphonamide. *Chemical Engineering Journal*, **2022**, 427, 131578	14.7	27
78	Highly transparent, healable, and durable anti-fogging coating by combining hydrophilic pectin and tannic acid with poly(ethylene terephthalate). *Green Chemistry*, **2019**, 21, 5405-5413	10	26
77	A novel strategy for enhancing the flame resistance, dynamic mechanical and the thermal degradation properties of epoxy nanocomposites. *Materials Research Express*, **2019**, 6, 125003	1.7	26
76	A Durable, Flexible, Large-Area, Flame-Retardant, Early Fire Warning Sensor with Built-In Patterned Electrodes.. *Small Methods*, **2021**, 5, e2001040	12.8	26

75	All-Organic Multilayer Coatings for Advanced Poly(lactic acid) Films with High Oxygen Barrier and Excellent Antifogging Properties. *ACS Applied Polymer Materials*, **2019**, 1, 3470-3476	4.3	25
74	High-pressure steam: A facile strategy for the scalable fabrication of flattened bamboo biomass. *Industrial Crops and Products*, **2019**, 129, 97-104	5.9	25
73	Stretchable strain sensors with dentate groove structure for enhanced sensing recoverability. *Composites Part B: Engineering*, **2021**, 211, 108641	10	24
72	A Reactive Copper-Organophosphate-MXene Heterostructure Enabled Antibacterial, Self-Extinguishing and Mechanically Robust Polymer Nanocomposites. *Chemical Engineering Journal* , **2021**, 430, 132712	14.7	24
71	Deposition growth of Zr-based MOFs on cerium phenylphosphonate lamella towards enhanced thermal stability and fire safety of polycarbonate. *Composites Part B: Engineering*, **2020**, 197, 108064	10	23
70	Highly Flexible Multilayered e-Skins for Thermal-Magnetic-Mechanical Triple Sensors and Intelligent Grippers. *ACS Applied Materials & Interfaces*, **2020**, 12, 15675-15685	9.5	21
69	Polypropylene/clay nanocomposites prepared by in situ grafting-melt intercalation with a novel cointercalating monomer. *Journal of Applied Polymer Science*, **2008**, 110, 616-623	2.9	21
68	Multifunctional polyurethane sponge coatings with excellent flame retardant, antibacterial, compressible, and recyclable properties. *Composites Part B: Engineering*, **2021**, 215, 108785	10	21
67	Facile fabrication of hydrolysis resistant phosphite antioxidants for high-performance optical PET films via in situ incorporation. *Chemical Engineering Journal*, **2017**, 328, 406-416	14.7	20
66	Dynamic Nanoconfinement Enabled Highly Stretchable and Supratough Polymeric Materials with Desirable Healability and Biocompatibility. *Advanced Materials*, **2021**, e2105829	24	20
65	A lava-inspired micro/nano-structured ceramifiable organic-inorganic hybrid fire-extinguishing coating. *Matter*, **2022**,	12.7	19
64	Fabrication of Nitrogen-Doped Graphene Decorated with Organophosphor and Lanthanum toward High-Performance ABS Nanocomposites. *ACS Applied Nano Materials*, **2018**, 1, 3204-3213	5.6	18
63	Electrochemically Stable Cobalt?Zinc Mixed Oxide/Hydroxide Hierarchical Porous Film Electrode for High-Performance Asymmetric Supercapacitor. *Nanomaterials*, **2019**, 9,	5.4	17
62	Fully Biobased Surface-Functionalized Microcrystalline Cellulose via Green Self-Assembly toward Fire-Retardant, Strong, and Tough Epoxy Biocomposites. *ACS Sustainable Chemistry and Engineering*,	8.3	17
61	Water governs the mechanical properties of poly(vinyl alcohol). *Polymer*, **2021**, 213, 123330	3.9	16
60	Bacteria-Triggered pH-Responsive Osteopotentiating Coating on 3D-Printed Polyetheretherketone Scaffolds for Infective Bone Defect Repair. *Industrial & Engineering Chemistry Research*, **2020**, 59, 12123-12135	3.9	15
59	Surface-initiated graft polymerization on multiwalled carbon nanotubes pretreated by corona discharge at atmospheric pressure. *Nanoscale*, **2010**, 2, 389-93	7.7	15
58	Enhanced toughness of PLLA/PCL blends using poly(d-lactide)-poly(□caprolactone)-poly(d-lactide) as compatibilizer. *Composites Communications*, **2020**, 21, 100385	6.7	14

57	Fire-safe, mechanically strong and tough thermoplastic Polyurethane/MXene nanocomposites with exceptional smoke suppression. *Materials Today Physics*, **2022**, 22, 100607	8	14
56	Scalable, Robust, Low-Cost, and Highly Thermally Conductive Anisotropic Nanocomposite Films for Safe and Efficient Thermal Management. *Advanced Functional Materials*,2110782	15.6	14
55	Mechanically robust and flame-retardant polylactide composites based on molecularly-engineered polyphosphoramides. *Composites Part A: Applied Science and Manufacturing*, **2021**, 144, 106317	8.4	14
54	Preparation of TiO/cellulose nanocomposites as antibacterial bio-adsorbents for effective phosphate removal from aqueous medium. *International Journal of Biological Macromolecules*, **2021** , 182, 434-444	7.9	14
53	Mechanically Strong, Thermally Healable, and Recyclable Epoxy Vitrimers Enabled by ZnAl-Layer Double Hydroxides. *ACS Sustainable Chemistry and Engineering*, **2021**, 9, 2580-2590	8.3	14
52	Bio-inspired, sustainable and mechanically robust graphene oxide-based hybrid networks for efficient fire protection and warning. *Chemical Engineering Journal*, **2022**, 134516	14.7	13
51	A hyperbranched P/N/B-containing oligomer as multifunctional flame retardant for epoxy resins. *Composites Part B: Engineering*, **2022**, 234, 109701	10	13
50	Flexible and flame-retarding phosphorylated MXene/polypropylene composites for efficient electromagnetic interference shielding. *Journal of Materials Science and Technology*, **2021**, 111, 66-66	9.1	13
49	Mechanical and thermal properties of PEEK composites by incorporating inorganic particles modified phosphates. *Composites Part B: Engineering*, **2021**, 212, 108715	10	13
48	Lightweight, amphipathic and fire-resistant prGO/MXene spherical beads for rapid elimination of hazardous chemicals. *Journal of Hazardous Materials*, **2022**, 423, 127069	12.8	13
47	Physical wrapping of reduced graphene oxide sheets by polyethylene wax and its modification on the mechanical properties of polyethylene. *Journal of Applied Polymer Science*, **2012**, 126, 1546-1555	2.9	12
46	Fire-retardant unsaturated polyester thermosets: The state-of-the-art, challenges and opportunities. *Chemical Engineering Journal*, **2022**, 430, 132785	14.7	12
45	Strong, Ultrafast, Reprogrammable Hydrogel Actuators with Muscle-Mimetic Aligned Fibrous Structures. *Chemistry of Materials*,	9.6	12
44	Engineering Interfaces toward High-Performance Polypropylene/Coir Fiber Biocomposites with Enhanced Friction and Wear Behavior. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 18453-18462	8.3	11
43	Improved Mechanical and Thermal Properties of Polypropylene Blends Based on Diethanolamine-Plasticized Corn Starch via in Situ Reactive Compatibilization. *Industrial & Engineering Chemistry Research*, **2013**, 52, 16232-16238	3.9	11
42	Highly Stretchable, Ultratough, and Strong Polyesters with Improved Postcrystallization Optical Property Enabled by Dynamic Multiple Hydrogen Bonds. *Macromolecules*, **2021**, 54, 1254-1266	5.5	11
41	Facile Fabrication of Polyolefin/Carbon Nanotube Composites via in Situ Friedel□Crafts Polyalkylation: Structure and Properties. *Industrial & Engineering Chemistry Research*, **2013**, 52, 14384-14395	3.9	10
40	Strong, tough and healable elastomer nanocomposites enabled by a hydrogen-bonded supramolecular network. *Composites Communications*, **2020**, 22, 100530	6.7	10

39	Probing Chemical Changes in Holocellulose and Lignin of Timbers in Ancient Buildings. *Polymers*, **2019**, 11,	4.5	9
38	Fabrication of flame retardant benzoxazine semi-biocomposites reinforced by ramie fabrics with bio-based flame retardant coating. *Polymer Composites*, **2018**, 39, E480-E488	3	9
37	Synthesis, characterization, and properties of degradable poly(l-lactic acid)/poly(butylene terephthalate) copolyesters containing 1,4-cyclohexanedimethanol. *Journal of Applied Polymer Science*, **2011**, 120, 2985-2995	2.9	9
36	Silicone/graphene oxide co-cross-linked aerogels with wide-temperature mechanical flexibility, super-hydrophobicity and flame resistance for exceptional thermal insulation and oil/water separation. *Journal of Materials Science and Technology*, **2022**, 114, 131-142	9.1	9
35	Fire Intumescent, High-Temperature Resistant, Mechanically Flexible Graphene Oxide Network for Exceptional Fire Shielding and Ultra-Fast Fire Warning.. *Nano-Micro Letters*, **2022**, 14, 92	19.5	9
34	Evaluating the flammability performance of Portland cement-bonded particleboards with different cement□wood ratios using a cone calorimeter. *Journal of Fire Sciences*, **2016**, 34, 199-211	1.5	8
33	Mechanically robust and abrasion-resistant polymer nanocomposites for potential applications as advanced clearance joints. *Composites Part A: Applied Science and Manufacturing*, **2019**, 126, 105607	8.4	8
32	A highly fire-retardant rigid polyurethane foam capable of fire-warning. *Composites Communications*, **2022**, 29, 101046	6.7	8
31	A nano-TiO2/regenerated cellulose biohybrid enables simultaneously improved strength and toughness of solid epoxy resins. *Composites Science and Technology*, **2021**, 212, 108884	8.6	8
30	Processing, thermal conductivity and flame retardant properties of silicone rubber filled with different geometries of thermally conductive fillers: A comparative study. *Composites Part B: Engineering*, **2022**, 238, 109907	10	8
29	Synthesis and Properties Investigation of Thiophene-aromatic Polyesters: Potential Alternatives for the 2,5-Furandicarboxylic Acid-based Ones. *Chinese Journal of Polymer Science (English Edition)*, **2020**, 38, 1082-1091	3.5	7
28	Effects of corona discharge on the surface structure, morphology and properties of multi-walled carbon nanotubes. *Applied Surface Science*, **2010**, 256, 6447-6453	6.7	7
27	Advances and challenges in eco-benign fire-retardant polylactide. *Materials Today Physics*, **2021**, 21, 100568	8	7
26	A Si-containing polyphosphoramide via green chemistry for fire-retardant polylactide with well-preserved mechanical and transparent properties. *Chemical Engineering Journal*, **2022**, 431, 134259	14.7	7
25	Recent advances in fire-retardant rigid polyurethane foam. *Journal of Materials Science and Technology*, **2022**, 112, 315-328	9.1	6
24	Nacre-bionic nanocomposite membrane for efficient in-plane dissipation heat harvest under high temperature. *Journal of Materiomics*, **2021**, 7, 219-225	6.7	6
23	Flexible pressure sensors via engineering microstructures for wearable human-machine interaction and health monitoring applications.. *IScience*, **2022**, 25, 104148	6.1	6
22	Sulfonated Block Ionomers Enable Transparent, Fire-Resistant, Tough yet Strong Polycarbonate. *Chemical Engineering Journal*, **2021**, 133264	14.7	5

21	Bioinspired, Strong, and Tough Nanostructured Poly(vinyl alcohol)/Inositol Composites: How Hydrogen-Bond Cross-Linking Works?. *Macromolecules*, **2021**, 54, 9510-9521	5.5	5
20	Insights into the hydrogen-bond cross-linking effects of small multiamine molecules on physical and mechanical properties of poly(vinly alcohol) by molecular dynamics simulations. *Modelling and Simulation in Materials Science and Engineering*, **2021**, 29, 035012	2	5
19	Effects of Two Types of Waste Wood Species on the Hydration Characteristic of Portland Cement. *Journal of Advanced Concrete Technology*, **2016**, 14, 13-20	2.3	5
18	Small multiamine molecule enabled fire-retardant polymeric materials with enhanced strength, toughness, and self-healing properties. *Chemical Engineering Journal*, **2022**, 440, 135645	14.7	5
17	Interface nanoengineering of a core-shell structured biobased fire retardant for fire-retarding polylactide with enhanced toughness and UV protection. *Journal of Cleaner Production*, **2022**, 336, 130372	10.3	4
16	Effects of BN/GO on the recyclable, healable and thermal conductivity properties of ENR/PLA thermoplastic vulcanizates. *Composites Part A: Applied Science and Manufacturing*, **2022**, 152, 106686	8.4	4
15	Structure, chain dynamics and mechanical properties of poly(vinyl alcohol)/phytic acid composites. *Composites Communications*, **2021**, 28, 100970	6.7	4
14	Recent advances in polysaccharide-based carbon aerogels for environmental remediation and sustainable energy. *Sustainable Materials and Technologies*, **2021**, 27, e00240	5.3	4
13	Strong and fast hydrogel actuators.. *Science*, **2022**, 376, 245	33.3	4
12	Green and Facile Synthesis of Bio-Based, Flame-Retardant, Latent Imidazole Curing Agent for Single-Component Epoxy Resin. *ACS Applied Polymer Materials*, **2022**, 4, 3564-3574	4.3	4
11	Layered Cellulose Nanofibers Nanocomposites via Layer by Layer Assembling. *Advanced Materials Research*, **2012**, 530, 56-61	0.5	3
10	Integrated Structure of Tin-Based Anodes Enhancing High Power Density and Long Cycle Life for Lithium Ion Batteries. *ACS Applied Energy Materials*, **2020**, 3, 9337-9347	6.1	3
9	Nickel ammonium phosphate and reduced graphene oxide two-dimensional hybrid material for improving the fire safety and mechanical properties of poly(vinyl chloride). *Polymer International*, **2020**, 69, 1227-1236	3.3	2
8	A core□shell-structured APP@COFs hybrid for enhanced flame retardancy and mechanical property of epoxy resin□(EP). *Advanced Composites and Hybrid Materials*,1	8.7	2
7	P, N-decorated halloysite nanotubes for flame retardancy enhancement of polyamide 6/aluminum diethylphosphinate. *Polymer Degradation and Stability*, **2022**, 196, 109847	4.7	2
6	High-Temperature Nitridation Induced Carbon Nanotubes@NiFe-Layered-Double-Hydroxide Nanosheets Taking as an Oxygen Evolution Reaction Electrocatalyst for CO2 Electroreduction. *Advanced Materials Interfaces*, **2021**, 8, 2101165	4.6	2
5	Governing effects of melt viscosity on fire performances of polylactide and its fire-retardant systems.. *IScience*, **2022**, 25, 103950	6.1	2
4	Nonisothermal Crystallization Behavior of Polypropylene-C60 Nanocomposites. *Journal of Macromolecular Science - Physics*, **2013**, 52, 1591-1602	1.4	1

3	Flame retardant polymer nanocomposites with fullerenes as filler276-313		1
2	The concept of light-harvesting, self-powered mechanical sensors using a monolithic structure. *Nano Energy*, **2022**, 107030	17.1	0
1	Back Cover: A Durable, Flexible, Large-Area, Flame-Retardant, Early Fire Warning Sensor with Built-In Patterned Electrodes (Small Methods 4/2021). *Small Methods*, **2021**, 5, 2170016	12.8	