Katia Sparnacci

List of Publications by Year
in descending order

123 papers	2,469 citations	159585 30 h-index	276875 41 g-index
124 all docs	124 docs citations	124 times ranked	2741 citing authors

#	Article	IF	Citations
1	Rapid thermal processing of self-assembling block copolymer thin films. Nanotechnology, 2013, 24, 315601.	2.6	72
2	Ultrathin Random Copolymer-Grafted Layers for Block Copolymer Self-Assembly. ACS Applied Materials & Interfaces, 2015, 7, 10944-10951.	8.0	71
3	Cationic PMMA Nanoparticles Bind and Deliver Antisense Oligoribonucleotides Allowing Restoration of Dystrophin Expression in the mdx Mouse. Molecular Therapy, 2009, 17, 820-827.	8.2	70
4	Fine Tuning of Lithographic Masks through Thin Films of PS-<i>b</i>-PMMA with Different Molar Mass by Rapid Thermal Processing. ACS Applied Materials & Interfaces, 2014, 6, 7180-7188.	8.0	64
5	Controlled Radical Polymerization of Styrene with Phosphoryl- and (Thiophosphoryl)dithioformates as RAFT Agents. Macromolecules, 2001, 34, 7269-7275.	4.8	59
6	Hybrid nanocomposites based on polystyrene and a reactive organophilic clay. Journal of Materials Science, 1998, 33, 2883-2888.	3.7	57
7	Ordering dynamics in symmetric PS-b-PMMA diblock copolymer thin films during rapid thermal processing. Journal of Materials Chemistry C, 2014, 2, 6655-6664.	5.5	54
8	PTFEâˆ’Polystyrene Coreâˆ’Shell Nanospheres and Nanocomposites. Macromolecules, 2003, 36, 4360-4367.	4.8	50
9	Dystrophin restoration in skeletal, heart and skin arrector pili smooth muscle of mdx mice by ZM2 NPâ€“AON complexes. Gene Therapy, 2010, 17, 432-438.	4.5	49
10	DNA prime and protein boost immunization with innovative polymeric cationic core-shell nanoparticles elicits broad immune responses and strongly enhance cellular responses of HIV-1 tat DNA vaccination. Vaccine, 2006, 24, 5655-5669.	3.8	46
11	Functional Polymeric Nano/Microparticles for Surface Adsorption and Delivery of Protein and DNA Vaccines. Current Drug Delivery, 2008, 5, 230-242.	1.6	44
12	Measuring the size and density of nanoparticles by centrifugal sedimentation and flotation. Analytical Methods, 2018, 10, 1725-1732.	2.7	44
13	On the Thermal Stability of PS-<i>b</i>-PMMA Block and P(S-<i>r</i>-MMA) Random Copolymers for Nanopatterning Applications. Macromolecules, 2013, 46, 8224-8234.	4.8	43
14	Flash grafting of functional random copolymers for surface neutralization. Journal of Materials Chemistry C, 2014, 2, 4909-4917.	5.5	43
15	New Ti-IMAC magnetic polymeric nanoparticles for phosphopeptide enrichment from complex real samples. Talanta, 2018, 178, 274-281.	5.5	42
16	Direct ESR Detection of Free Radicals in the RAFT Polymerization of Styrene. Macromolecules, 2003, 36, 736-740.	4.8	39
17	Novel biocompatible anionic polymeric microspheres for the delivery of the HIV-1 Tat protein for vaccine application. Vaccine, 2004, 22, 2910-2924.	3.8	39
18	Induction of humoral and enhanced cellular immune responses by novel coreâ€“shell nanosphere- and microsphere-based vaccine formulations following systemic and mucosal administration. Vaccine, 2009, 27, 3605-3615.	3.8	39

#	Article	IF	Citations
19	Bessel-like photonic nanojets from core-shell sub-wavelength spheres. Optics Letters, 2014, 39, 3989.	3.3	39
20	PTFE-Based Coreâˆ’Soft Shell Nanospheres and Soft Matrix Nanocomposites. Macromolecules, 2009, 42, 3518-3524.	4.8	37
21	Self-cleaning properties in engineered sensors for dopamine electroanalytical detection. Analyst, The, 2015, 140, 1486-1494.	3.5	36
22	Control of Doping Level in Semiconductors <i>via</i> Self-Limited Grafting of Phosphorus End-Terminated Polymers. ACS Nano, 2018, 12, 178-186.	14.6	35
23	A New Facile Synthesis of Tertiary Dithioesters. Journal of Organic Chemistry, 2002, 67, 7911-7914.	3.2	34
24	Preparation and Characterization of Innovative Protein-coated Poly(Methylmethacrylate) Core-shell Nanoparticles for Vaccine Purposes. Pharmaceutical Research, 2007, 24, 1870-1882.	3.5	34
25	Patterning of polymer brushes made easy using titanium dioxide: direct and remote photocatalytic lithography. Chemical Communications, 2015, 51, 7313-7316.	4.1	34
26	Fabrication of flexible silicon nanowires by self-assembled metal assisted chemical etching for surface enhanced Raman spectroscopy. RSC Advances, 2016, 6, 93649-93659.	3.6	34
27	Coreâ€“shell microspheres by dispersion polymerization as drug delivery systems. Macromolecular Chemistry and Physics, 2002, 203, 1364-1369.	2.2	33
28	Comparison of novel delivery systems for antisense peptide nucleic acids. Journal of Controlled Release, 2005, 109, 24-36.	9.9	33
29	Size scaling of mesoporous silica membranes produced by nanosphere mediated laser ablation. Nanotechnology, 2012, 23, 485305.	2.6	33
30	Influence of the long-range ordering of gold-coated Si nanowires on SERS. Scientific Reports, 2018, 8, 11305.	3.3	33
31	PTFEâ€“PMMA coreâ€“shell colloidal particles as building blocks for selfâ€assembled opals: synthesis, properties and optical response. Polymer International, 2012, 61, 1294-1301.	3.1	32
32	Thermal and mechanical properties of PES/PTFE composites and nanocomposites. Journal of Applied Polymer Science, 2013, 130, 3624-3633.	2.6	31
33	Thermally induced self-assembly of cylindrical nanodomains in low molecular weight PS-<i>b</i>-PMMA thin films. Nanotechnology, 2014, 25, 045301.	2.6	31
34	Characterization of ultra-thin polymeric films by Gas chromatography-Mass spectrometry hyphenated to thermogravimetry. Journal of Chromatography A, 2014, 1368, 204-210.	3.7	31
35	Uniformly sized molecularly imprinted polymers (MIPs) for 17Î²-estradiol. Macromolecular Chemistry and Physics, 2002, 203, 1532-1538.	2.2	29
36	Evidence of Cybotactic Order in the Nematic Phase of a Main-Chain Liquid Crystal Polymer with Bent-Core Repeat Unit. ACS Macro Letters, 2014, 3, 91-95.	4.8	29

#	ARTICLE	IF	CITATIONS
37	Scaling of correlation length in lamellae forming PS-b-PMMA thin films upon high temperature rapid thermal treatments. Journal of Materials Chemistry C, 2015, 3, 8618-8624.	5.5	29
38	Micellar-type complexes of tailor-made synthetic block copolymers containing the HIV-1 tat DNA for vaccine application. Vaccine, 2002, 20, 2303-2317.	3.8	28
39	Thermal Stability of Functional P(S-r-MMA) Random Copolymers for Nanolithographic Applications. ACS Applied Materials & Interfaces, 2015, 7, 3920-3930.	8.0	28
40	Immunization with low doses of HIV-1 tat DNA delivered by novel cationic block copolymers induces CTL responses against Tat. Vaccine, 2003, 21, 1103-1111.	3.8	27
41	A Multidisciplinary Approach to the Use of Pyridinyl Dithioesters and Their N-Oxides as CTAs in the RAFT Polymerization of Styrene. Not the Chronicle of a Failure Foretold. Macromolecules, 2005, 38, 7610-7618.	4.8	26
42	Depth Profiling and Melting of Nanoparticles in Secondary Ion Mass Spectrometry (SIMS). Journal of Physical Chemistry C, 2013, 117, 16042-16052.	3.1	26
43	Evolution of lateral ordering in symmetric block copolymer thin films upon rapid thermal processing. Nanotechnology, 2014, 25, 275601.	2.6	26
44	Diblock and triblock functional copolymers by controlled radical polymerization. Journal of Polymer Science Part A, 1999, 37, 1237-1244.	2.3	24
45	PMMAâ€based coreâ€shell nanoparticles with various PTFE cores. Journal of Polymer Science Part A, 2009, 47, 2928-2937.	2.3	24
46	Coreâ€“shell microspheres by dispersion polymerization as promising delivery systems for proteins. Journal of Biomaterials Science, Polymer Edition, 2005, 16, 1557-1574.	3.5	23
47	Functional fluorescent nonporous silica nanoparticles as carriers for Pt(IV) anticancer prodrugs. Journal of Inorganic Biochemistry, 2015, 151, 132-142.	3.5	22
48	Enhanced Lateral Ordering in Cylinder Forming PS-<i>b</i>-PMMA Block Copolymers Exploiting the Entrapped Solvent. ACS Applied Materials & Interfaces, 2016, 8, 8280-8288.	8.0	22
49	Development of an enrichment method for endogenous phosphopeptide characterization in human serum. Analytical and Bioanalytical Chemistry, 2018, 410, 1177-1185.	3.7	22
50	Hierarchical Order in Dewetted Block Copolymer Thin Films on Chemically Patterned Surfaces. ACS Nano, 2018, 12, 7076-7085.	14.6	22
51	Biodistribution and Molecular Studies on Orally Administered Nanoparticle-AON Complexes Encapsulated with Alginate Aiming at Inducing Dystrophin Rescue in<i>mdx</i>Mice. BioMed Research International, 2013, 2013, 1-13.	1.9	21
52	High temperature surface neutralization process with random copolymers for block copolymer selfâ€assembly. Polymer International, 2017, 66, 459-467.	3.1	21
53	Determining the Thickness and Completeness of the Shell of Polymer Coreâ€“Shell Nanoparticles by X-ray Photoelectron Spectroscopy, Secondary Ion Mass Spectrometry, and Transmission Scanning Electron Microscopy. Journal of Physical Chemistry C, 2019, 123, 29765-29775.	3.1	21
54	Effect of Trapped Solvent on the Interface between PS-<i>b</i>-PMMA Thin Films and P(S-<i>r</i>-MMA) Brush Layers. ACS Applied Materials & Interfaces, 2020, 12, 7777-7787.	8.0	21

#	Article	IF	Citations
55	Complex associates of plasmid DNA and a novel class of block copolymers with PEG and cationic segments as new vectors for gene delivery. Journal of Biomaterials Science, Polymer Edition, 2001, 12, 209-228.	3.5	19
56	Persistent Dystrophin Protein Restoration 90 Days after a Course of Intraperitoneally Administered Naked 2â€²OMePS AON and ZM2 NP-AON Complexes in mdx Mice. Journal of Biomedicine and Biotechnology, 2012, 2012, 1-8.	3.0	19
57	Micrometer-Scale Ordering of Silicon-Containing Block Copolymer Thin Films via High-Temperature Thermal Treatments. ACS Applied Materials & Interfaces, 2016, 8, 9897-9908.	8.0	19
58	Effect of the Density of Reactive Sites in P(Sâ€<i>r</i>â€MMA) Film during Al₂O₃ Growth by Sequential Infiltration Synthesis. Advanced Materials Interfaces, 2019, 6, 1900503.	3.7	19
59	Measuring the relative concentration of particle populations using differential centrifugal sedimentation. Analytical Methods, 2018, 10, 2647-2657.	2.7	18
60	Doping of silicon by phosphorus end-terminated polymers: drive-in and activation of dopants. Journal of Materials Chemistry C, 2020, 8, 10229-10237.	5.5	17
61	TGA-GCâ€“MS quantitative analysis of phosphorus-end capped functional polymers in bulk and ultrathin films. Journal of Analytical and Applied Pyrolysis, 2017, 128, 238-245.	5.5	16
62	On the multiple crystallization behavior of PTFE in PMMA/PTFE nanocomposites from coreâ€“shell nanoparticles. Journal of Polymer Science, Part B: Polymer Physics, 2010, 48, 548-554.	2.1	15
63	Neutral wetting brush layers for block copolymer thin films using homopolymer blends processed at high temperatures. Nanotechnology, 2015, 26, 415603.	2.6	15
64	Effect of Entrapped Solvent on the Evolution of Lateral Order in Self-Assembled P(S-<i>r</i>-MMA)/PS-<i>b</i>-PMMA Systems with Different Thicknesses. ACS Applied Materials & Interfaces, 2017, 9, 31215-31223.	8.0	15
65	Thermal Degradation in Ultrathin Films Outperforms Dose Control of n-Type Polymeric Dopants for Silicon. ACS Applied Electronic Materials, 2019, 1, 1807-1816.	4.3	15
66	Core-shell functional nanospheres for oligonucleotide delivery. II. Journal of Polymer Science Part A, 2000, 38, 1110-1117.	2.3	14
67	Sulfonates-PMMA nanoparticles conjugates: A versatile system for multimodal application. Bioorganic and Medicinal Chemistry, 2012, 20, 6640-6647.	3.0	14
68	A Multiâ€optical Collector of Sunlight Employing Luminescent Materials and Photonic Nanostructures. Advanced Optical Materials, 2016, 4, 147-155.	7.3	14
69	Toward Lateral Length Standards at the Nanoscale Based on Diblock Copolymers. ACS Applied Materials & Interfaces, 2017, 9, 15685-15697.	8.0	14
70	Preparation, Properties, and Self-Assembly Behavior of PTFE-Based Core-Shell Nanospheres. Journal of Nanomaterials, 2012, 2012, 1-15.	2.7	12
71	Core-shell functional nanospheres for oligonucleotide delivery. III. Stealth nanospheres. Journal of Polymer Science Part A, 2000, 38, 3347-3355.	2.3	11
72	An ESR Approach to the Estimation of the Rate Constants of the Addition and Fragmentation Processes Involved in the RAFT Polymerization of Styrene. Helvetica Chimica Acta, 2006, 89, 2103-2118.	1.6	11

#	Article	IF	Citations
73	Twoâ€dimensional nonâ€closeâ€packed arrays of nanoparticles via coreâ€shell nanospheres and reactive ion etching. Polymers for Advanced Technologies, 2012, 23, 558-564.	3.2	11
74	Evidence of Mechanochemical Control in â€œGrafting toâ€• Reactions of Hydroxy-Terminated Statistical Copolymers. Macromolecules, 2021, 54, 499-508.	4.8	11
75	Poly(methylmetacrylate) (PMMA) coreâ€“shell nanospheres act as efficient pharmacophores for the antiproliferative [PtCl3(NH3)]â^' complex by forming ionic couples. Inorganica Chimica Acta, 2009, 362, 4099-4109.	2.4	10
76	Priming with a very low dose of DNA complexed with cationic block copolymers followed by protein boost elicits broad and long-lasting antigen-specific humoral and cellular responses in mice. Vaccine, 2009, 27, 4498-4507.	3.8	10
77	Surface-Energy Control and Characterization of Nanoparticle Coatings. Journal of Physical Chemistry C, 2020, 124, 11200-11211.	3.1	10
78	Preparation and Thermal Characterization of PTFE/PES Nanocomposites. Macromolecular Symposia, 2012, 311, 70-76.	0.7	9
79	Glowing Teacup Demonstration: Trautzâ€“Schorigin Reaction of Natural Polyphenols. Journal of Chemical Education, 2012, 89, 1297-1300.	2.3	9
80	Preparation and properties of PTFE/PAI nanocomposites. Polymer Composites, 2013, 34, 1451-1459.	4.6	9
81	Photocatalytic Lithography: An Innovative Approach to Obtain Patterned pH-responsive Polymer Brushes. Materials Today: Proceedings, 2015, 2, 4183-4189.	1.8	9
82	Polycarbonateâ€based composites reinforced by in situ polytetrafluoroethylene fibrillation: Preparation, thermal and rheological behavior. Journal of Applied Polymer Science, 2015, 132, .	2.6	9
83	Fully bio-renewable multiblocks copolymers of poly(lactide) and commercial fatty acid-based polyesters polyols: Synthesis and characterization. European Polymer Journal, 2016, 81, 247-256.	5.4	9
84	Determining nonuniformities of coreâ€shell nanoparticle coatings by analysis of the inelastic background of Xâ€ray photoelectron spectroscopy survey spectra. Surface and Interface Analysis, 2020, 52, 770-777.	1.8	9
85	Macro and quasiâ€mesoporous silicon by selfâ€assembling and metal assisted etching. Physica Status Solidi (A) Applications and Materials Science, 2011, 208, 1403-1406.	1.8	8
86	Shell thickness determination for PTFEâ€PS coreâ€shell nanoparticles using scanning transmission Xâ€ray microscopy (STXM). Surface and Interface Analysis, 2018, 50, 1077-1082.	1.8	8
87	Directed Self-Assembly of Polystyrene Nanospheres by Direct Laser-Writing Lithography. Nanomaterials, 2020, 10, 280.	4.1	8
88	Silicon Doping by Polymer Grafting: Size Distribution Matters. ACS Applied Polymer Materials, 2021, 3, 6383-6393.	4.4	8
89	Enhanced antisense effect of modified PNAs delivered through functional PMMA microspheres. International Journal of Pharmaceutics, 2006, 324, 83-91.	5.2	7
90	Thermal and DMA Characterization of PTFEâ€PMMA Nanocomposites from Coreâ€Shell Nanoparticles. Macromolecular Symposia, 2010, 296, 197-202.	0.7	7

#	Article	IF	Citations
91	Photoactive spherical colloids for opal photonic crystals. Polymer Composites, 2013, 34, 1443-1450.	4.6	7
92	Effect of shell structure of Ti-immobilized metal ion affinity chromatography core-shell magnetic particles for phosphopeptide enrichment. Scientific Reports, 2019, 9, 15782.	3.3	7
93	Magnetic molecularly imprinted multishell particles for zearalenone recognition. Polymer, 2020, 188, 122102.	3.8	7
94	Composition of ultrathin binary polymer brushes by thermogravimetryâ€“gas chromatographyâ€“mass spectrometry. Analytical and Bioanalytical Chemistry, 2016, 408, 3155-3163.	3.7	6
95	Electrostatic Interaction of Negatively Charged Coreâ€“Shell Nanoparticles with Antitumoral Cationic Platinumâ€Based Complexes. European Journal of Inorganic Chemistry, 2011, 2011, 3289-3294.	2.0	5
96	Physical ageing reduction in PES through the incorporation of rigid non-interacting PTFE nanoparticles. Thermochimica Acta, 2013, 571, 53-59.	2.7	5
97	Coreâ€“shell silicaâ€“rhodamine B nanosphere for synthetic opals: from fluorescence spectral redistribution to sensing. RSC Advances, 2020, 10, 14958-14964.	3.6	5
98	Tailor-made core-shell nanospheres for antisense oligonucleotide delivery: IV.Adsorption/release behaviour. Journal of Biomaterials Science, Polymer Edition, 2001, 12, 1339-1357.	3.5	4
99	Preparation and Properties of PTFE-PMMA Core-Shell Nanoparticles and Nanocomposites. Journal of Nanotechnology, 2012, 2012, 1-10.	3.4	4
100	Molar mass and composition effects on the thermal stability of functional P(S-<i>r</i>-MMA) random copolymers for nanolithographic applications. Molecular Systems Design and Engineering, 2017, 2, 581-588.	3.4	4
101	Polymer Nanoparticle Identification and Concentration Measurement Using Fiber-Enhanced Raman Spectroscopy. Chemosensors, 2020, 8, 21.	3.6	4
102	Biocompatible Anionic Polymeric Microspheres as Priming Delivery System for Effetive HIV/AIDS Tat-Based Vaccines. PLoS ONE, 2014, 9, e111360.	2.5	4
103	Preparation, properties and self-assembly behavior of PTFE based core-shell nanospheres. AIP Conference Proceedings, 2012, , .	0.4	3
104	The â€œMushroom Cloudâ€•Demonstration Revisited. Journal of Chemical Education, 2013, 90, 765-767.	2.3	2
105	Antisense peptide nucleic acid delivered by core-shell microspheres. Journal of Controlled Release, 2005, 101, 397-8.	9.9	2
106	Coreâ€“shell nanospheres for oligonucleotide delivery. V: Adsorption/release behavior of 'stealth' nanospheres. Journal of Biomaterials Science, Polymer Edition, 2003, 14, 1209-1227.	3.5	1
107	T.P.22 Nanoparticles as delivery systems for antisense oligoribonucleotides: Biodistribution studies and definition of the release kinetic in treated mdx mice. Neuromuscular Disorders, 2012, 22, 859.	0.6	1
108	The surface nanostructurations by means of near field enhancement with nanospheres. Proceedings of SPIE, 2013, , .	0.8	1

#	Article	IF	Citations
109	Surface engineering with functional random copolymers for nanolithographic applications. AIP Conference Proceedings, 2016, , .	0.4	1
110	From grafting to to grafting from. AIP Conference Proceedings, 2018, , .	0.4	1
111	Controlled Free-Radical Polymerization: New Breath in a Mature Technology. Polymer News, 2005, 30, 110-119.	0.1	1
112	A New Facile Synthesis of Tertiary Dithioesters.. ChemInform, 2003, 34, no.	0.0	0
113	T.P.2.07 The systemic administration of a low dose of 2OMePS-AON combined with novel cationic polymethylmethacrylate nanoparticles induces the rescue of dystrophin expression in the mdx murine model. Neuromuscular Disorders, 2008, 18, 758.	0.6	0
114	O.14 Biocompatible nanoparticles as slow-release delivery system of 2â€²OMePS AON administered both intraperitoneally and orally in the mdx mice: dystrophin rescue and nanoparticles biodistribution. Neuromuscular Disorders, 2011, 21, 704.	0.6	0
115	Mesoporous silica membranes by self-assembled nanospheres and mediated laser ablation. , 2012, , .		0
116	Neutral wetting brush layers for block copolymer thin films using homopolymer blends. AIP Conference Proceedings, 2016, , .	0.4	0
117	Multishell hybrid magnetic nanoparticles for phosphopeptide enrichment. AIP Conference Proceedings, 2018, , .	0.4	0
118	Analysis of phosphorus-end capped functionalpolymers, from bulk to ultrathin films. AIP Conference Proceedings, 2018, , .	0.4	0
119	Deterministic doping via self-limited grafting of phosphorus end-terminated polymers. AIP Conference Proceedings, 2018, , .	0.4	0
120	Boron-terminated polystyrene as potential spin-on dopant for microelectronic applications. AIP Conference Proceedings, 2018, , .	0.4	0
121	HPLC method for the determination of monomer conversion and composition during the poly(styrene-<i>r</i>-methylmethacrylate) polymerization. International Journal of Polymer Analysis and Characterization, 2020, 25, 188-197.	1.9	0
122	Assessment of the In Vivo Antiproliferative Activity of a Novel Platinum Particulate Pharmacophore. , 2009, , 19-25.		0
123	Spherical Colloid Engineering. , 2015, , 103-125.		0