Luigi Ambrosio

List of Publications by Year
in descending order

239	10,919	25014	45285
papers	citations	57 h-index	90 g-index

243	243	243	13199
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Transport equation and Cauchy problem for BV vector fields. Inventiones Mathematicae, 2004, 158, 227-260.	1.3	470
2	Novel superabsorbent celluloseâ€based hydrogels crosslinked with citric acid. Journal of Applied Polymer Science, 2008, 110, 2453-2460.	1.3	386
3	The effect of matrix composition of 3D constructs on embryonic stem cell differentiation. Biomaterials, 2005, 26, 6194-6207.	5.7	237
4	Polymeric hydrogels for burn wound care: Advanced skin wound dressings and regenerative templates. Burns and Trauma, 2014, 2, 153.	0.7	235
5	A multi-functional scaffold for tissue regeneration: The need to engineer a tissue analogue. Biomaterials, 2007, 28, 5093-5099.	5.7	232
6	A novel poloxamers/hyaluronic acid in situ forming hydrogel for drug delivery: Rheological, mucoadhesive and in vitro release properties. European Journal of Pharmaceutics and Biopharmaceutics, 2008, 70, 199-206.	2.0	228
7	Currents in metric spaces. Acta Mathematica, 2000, 185, 1-80.	1.4	223
8	Bioactive scaffolds for bone and ligament tissue. Expert Review of Medical Devices, 2007, 4, 405-418.	1.4	197
9	Polylactic acid fibre-reinforced polycaprolactone scaffolds for bone tissue engineering. Biomaterials, 2008, 29, 3662-3670.	5.7	184
10	Rectifiable sets in metric and Banach spaces. Mathematische Annalen, 2000, 318, 527-555.	0.7	182
11	Conductive PANi/PEGDA Macroporous Hydrogels For Nerve Regeneration. Advanced Healthcare Materials, 2013, 2, 218-227.	3.9	182
12	Metal-Based Antibacterial Substrates for Biomedical Applications. Biomacromolecules, 2015, 16, 1873-1885.	2.6	139
13	Influence of Gelatin Cues in PCL Electrospun Membranes on Nerve Outgrowth. Biomacromolecules, 2010, 11, 2238-2246.	2.6	134
14	PCL microspheres based functional scaffolds by bottom-up approach with predefined microstructural properties and release profiles. Biomaterials, 2008, 29, 4800-4807.	5.7	131
15	Towards the Design of 3D Fiber-Deposited Poly(-caprolactone)/Iron-Doped Hydroxyapatite Nanocomposite Magnetic Scaffolds for Bone Regeneration. Journal of Biomedical Nanotechnology, 2015, 11, 1236-1246.	0.5	125
16	Additive manufacturing of wet-spun polymeric scaffolds for bone tissue engineering. Biomedical Microdevices, 2012, 14, 1115-1127.	1.4	118
17	New macroporous calcium phosphate glass ceramic for guided bone regeneration. Biomaterials, 2004, 25, 4233-4241.	5.7	116
18	The role of reduced graphene oxide on chemical, mechanical and barrier properties of natural rubber composites. Composites Science and Technology, 2014, 102, 74-81.	3.8	113

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19	Gradient Flows of Probability Measures. Handbook of Differential Equations: Evolutionary Equations, 2007, 3, 1-136.	0.9	109
20	Tissue Engineering for Total Meniscal Substitution: Animal Study in Sheep Model. Tissue Engineering - Part A, 2008, 14, 1067-1080.	1.6	108
21	Layer-by-Layer Self-Assembly of Chitosan and Poly(Î³-glutamic acid) into Polyelectrolyte Complexes. Biomacromolecules, 2011, 12, 4183-4195.	2.6	107
22	Collagen-low molecular weight hyaluronic acid semi-interpenetrating network loaded with gelatin microspheres for cell and growth factor delivery for nucleus pulposus regeneration. Acta Biomaterialia, 2015, 20, 10-21.	4.1	105
23	Tailoring Assembly of Reduced Graphene Oxide Nanosheets to Control Gas Barrier Properties of Natural Rubber Nanocomposites. ACS Applied Materials & Interfaces, 2014, 6, 2230-2234.	4.0	103
24	Nanoparticle-Integrated Hydrogels as Multifunctional Composite Materials for Biomedical Applications. Gels, 2015, 1, 162-178.	2.1	100
25	Some Fine Properties of Sets of Finite Perimeter in Ahlfors Regular Metric Measure Spaces. Advances in Mathematics, 2001, 159, 51-67.	0.5	99
26	Tissue Engineering for Total Meniscal Substitution: Animal Study in Sheep Modelâ€"Results at 12 Months. Tissue Engineering - Part A, 2012, 18, 1573-1582.	1.6	99
27	Atomic Force Microscopy: A Powerful Tool to Address Scaffold Design in Tissue Engineering. Journal of Functional Biomaterials, 2017, 8, 7.	1.8	96
28	Hyaluronic Acid Based Hydrogels for Regenerative Medicine Applications. BioMed Research International, 2015, 2015, 1-12.	0.9	94
29	Fine Properties of Sets of Finite Perimeter in Doubling Metric Measure Spaces. Set-Valued and Variational Analysis, 2002, 10, 111-128.	0.5	92
30	PLDLA/PCL-T Scaffold for Meniscus Tissue Engineering. BioResearch Open Access, 2013, 2, 138-147.	2.6	85
31	Rheological and mechanical properties of acellular and cellâ€laden methacrylated gellan gum hydrogels. Journal of Biomedical Materials Research - Part A, 2013, 101, 3438-3446.	2.1	84
32	The role of hydroxyapatite as solid signal on performance of PCL porous scaffolds for bone tissue regeneration. Journal of Biomedical Materials Research - Part B Applied Biomaterials, 2008, 86B, 548-557.	1.6	82
33	The Soybean Isoflavone Genistein Induces Differentiation of MG63 Human Osteosarcoma Osteoblasts. Journal of Nutrition, 2006, 136, 1166-1170.	1.3	80
34	A New Class of Bioactive and Biodegradable Soybean-Based Bone Fillers. Biomacromolecules, 2007, 8, 2706-2711.	2.6	76
35	Histomorphometric, ultrastructural and microhardness evaluation of the osseointegration of a nanostructured titanium oxide coating by metal-organic chemical vapour deposition: an in vivo study. Biomaterials, 2004, 25, 5583-5591.	5.7	74
36	3D additive-manufactured nanocomposite magnetic scaffolds: Effect of the application mode of a time-dependent magnetic field on hMSCs behavior. Bioactive Materials, 2017, 2, 138-145.	8.6	72

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37	Viscoelastic Properties of Rabbit Vocal Folds after Augmentation. Otolaryngology - Head and Neck Surgery, 2003, 128, 401-406.	1.1	71
38	A 3D analysis of mechanically stressed dentin?adhesive?composite interfaces using X-ray micro-CT. Biomaterials, 2005, 26, 257-270.	5.7	71
39	Injectable Thermally Responsive Mucoadhesive Gel for Sustained Protein Delivery. Biomacromolecules, 2011, 12, 28-33.	2.6	71
40	Hybrid composite scaffolds prepared by solâ€“gel method for bone regeneration. Composites Science and Technology, 2010, 70, 1861-1868.	3.8	70
41	Structural and Mechanical Properties of UV-Photo-Cross-Linked Poly(N-vinyl-2-pyrrolidone) Hydrogels. Biomacromolecules, 2008, 9, 231-240.	2.6	69
42	Tuning Size Scale and Crystallinity of PCL Electrospun Fibres via Solvent Permittivity to Address hMSC Response. Macromolecular Bioscience, 2011, 11, 1694-1705.	2.1	69
43	Injectable Functional Biomaterials for Minimally Invasive Surgery. Advanced Healthcare Materials, 2020, 9, e2000349.	3.9	69
44	Existence and stability for Fokkerâ€“Planck equations with log-concave reference measure. Probability Theory and Related Fields, 2009, 145, 517-564.	0.9	68
45	3D fibre deposition and stereolithography techniques for the design of multifunctional nanocomposite magnetic scaffolds. Journal of Materials Science: Materials in Medicine, 2015, 26, 250.	1.7	65
46	Intrinsic regular hypersurfaces in Heisenberg groups. Journal of Geometric Analysis, 2006, 16, 187-232.	0.5	64
47	Rheological Characterization of Hyaluronic Acid Derivatives as Injectable Materials Toward Nucleus Pulposus Regeneration. Journal of Biomaterials Applications, 2012, 26, 745-759.	1.2	64
48	A comparison of the performance of mono- and bi-component electrospun conduits in a rat sciatic model. Biomaterials, 2014, 35, 8970-8982.	5.7	64
49	Structural and rheological characterization of hyaluronic acid-based scaffolds for adipose tissue engineering. Biomaterials, 2007, 28, 4399-4408.	5.7	63
50	Dynamic-mechanical properties of a novel composite intervertebral disc prosthesis. Journal of Materials Science: Materials in Medicine, 2007, 18, 2159-2165.	1.7	63
51	Borate cross-linked graphene oxideâ€“chitosan as robust and high gas barrier films. Nanoscale, 2016, 8, 10783-10791.	2.8	62
52	Soybean-based biomaterials: preparation, properties and tissue regeneration potential. Expert Review of Medical Devices, 2008, 5, 349-358.	1.4	61
53	Systematic Analysis of Injectable Materials and 3D Rapid Prototyped Magnetic Scaffolds: From CNS Applications to Soft and Hard Tissue Repair/Regeneration. Procedia Engineering, 2013, 59, 233-239.	1.2	60
54	Exfoliated Black Phosphorus Promotes in Vitro Bone Regeneration and Suppresses Osteosarcoma Progression through Cancer-Related Inflammation Inhibition. ACS Applied Materials & Interfaces, 2019, 11, 9333-9342.	4.0	60

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55	Electro-Active Polymers (EAPs): A Promising Route to Design Bio-Organic/Bioinspired Platforms with on Demand Functionalities. Polymers, 2016, 8, 185.	2.0	59
56	Hydrogel-Based Platforms for the Regeneration of Osteochondral Tissue and Intervertebral Disc. Polymers, 2012, 4, 1590-1612.	2.0	57
57	Novel polysaccharides-based viscoelastic formulations for ophthalmic surgery: Rheological characterization. Biomaterials, 2006, 27, 5134-5142.	5.7	56
58	Novel finishing treatments of polyamide fabrics by electrofluidodynamic process to reduce microplastic release during washings. Polymer Degradation and Stability, 2019, 165, 110-116.	2.7	56
59	A Multi-component Fiber-reinforced PHEMA-based Hydrogel/HAPEX^{TM} Device for Customized Intervertebral Disc Prosthesis. Journal of Biomaterials Applications, 2011, 25, 795-810.	1.2	55
60	In vitro mineralization and bone osteogenesis in poly(Îµâ€caprolactone)/gelatin nanofibers. Journal of Biomedical Materials Research - Part A, 2012, 100A, 3008-3019.	2.1	55
61	Optimization of fully aligned bioactive electrospun fibers for â€œin vitroâ€•nerve guidance. Journal of Materials Science: Materials in Medicine, 2014, 25, 2323-2332.	1.7	54
62	Regeneration of Achilles' Tendon: The Role of Dynamic Stimulation for Enhanced Cell Proliferation and Mechanical Properties. Journal of Biomaterials Science, Polymer Edition, 2010, 21, 1173-1190.	1.9	53
63	Polymer-based platforms by electric field-assisted techniques for tissue engineering and cancer therapy. Expert Review of Medical Devices, 2015, 12, 113-129.	1.4	53
64	Longâ€Lasting Efficacy of Coatings for Bronze Artwork Conservation: The Key Role of Layered Double Hydroxide Nanocarriers in Protecting Corrosion Inhibitors from Photodegradation. Angewandte Chemie - International Edition, 2018, 57, 7380-7384.	7.2	53
65	Viscoelasticity of Rabbit Vocal Folds After Injection Augmentation. Laryngoscope, 2004, 114, 138-142.	1.1	52
66	Nanocomposites for Neurodegenerative Diseases: Hydrogel-Nanoparticle Combinations for a Challenging Drug Delivery. International Journal of Artificial Organs, 2011, 34, 1115-1127.	0.7	52
67	Bone Tissue Engineering: 3D PCL-based Nanocomposite Scaffolds with Tailored Properties. Procedia CIRP, 2016, 49, 51-54.	1.0	52
68	Gelatin/nanoâ€hydroxyapatite hydrogel scaffold prepared by solâ€gel technology as filler to repair bone defects. Journal of Biomedical Materials Research - Part A, 2018, 106, 2007-2019.	2.1	52
69	Macroporous alginate foams crosslinked with strontium for bone tissue engineering. Carbohydrate Polymers, 2018, 202, 72-83.	5.1	52
70	Mineralization behavior with mesenchymal stromal cells in a biomimetic hyaluronic acid-based scaffold. Biomaterials, 2010, 31, 3986-3996.	5.7	50
71	Bicomponent electrospun scaffolds to design extracellular matrix tissue analogs. Expert Review of Medical Devices, 2016, 13, 83-102.	1.4	50
72	Bioactivation Routes of Gelatin-Based Scaffolds to Enhance at Nanoscale Level Bone Tissue Regeneration. Frontiers in Bioengineering and Biotechnology, 2019, 7, 27.	2.0	50

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73	Cu-Releasing Bioactive Glass Coatings and Their in Vitro Properties. ACS Applied Materials & Interfaces, 2019, 11, 5812-5820.	4.0	49
74	Polymer-based composite scaffolds for tissue engineering. Journal of Applied Biomaterials and Biomechanics, 2010, 8, 57-67.	0.4	49
75	Multidisciplinary Perspectives for Alzheimer's and Parkinson's Diseases: Hydrogels for Protein Delivery and Cell-Based Drug Delivery as Therapeutic Strategies. International Journal of Artificial Organs, 2009, 32, 836-850.	0.7	48
76	Bone regeneration potential of a soybean-based filler: experimental study in a rabbit cancellous bone defects. Journal of Materials Science: Materials in Medicine, 2010, 21, 615-626.	1.7	48
77	Ibuprofen-loaded poly(trimethylene carbonate-co-Îµ-caprolactone) electrospun fibres for nerve regeneration. Journal of Tissue Engineering and Regenerative Medicine, 2016, 10, E154-E166.	1.3	48
78	Influence of electrospun fiber mesh size on hMSC oxygen metabolism in 3D collagen matrices: Experimental and theoretical evidences. Biotechnology and Bioengineering, 2011, 108, 1965-1976.	1.7	47
79	Poly(lactic acid)/titanium dioxide nanocomposite films: Influence of processing procedure on dispersion of titanium dioxide and photocatalytic activity. Polymer Composites, 2011, 32, 519-528.	2.3	46
80	Design of Porous Three-Dimensional PDLLA/nano-hap Composite Scaffolds Using Stereolithography. Journal of Applied Biomaterials and Functional Materials, 2012, 10, 249-258.	0.7	46
81	Effects of polymer amount and processing conditions on the in vitro behaviour of hybrid titanium dioxide/polycaprolactone composites. Biomaterials, 2007, 28, 2801-2809.	5.7	45
82	The Influence of Hydroxyapatite Particles on In Vitro Degradation Behavior of Poly É›-Caprolactoneâ€“Based Composite Scaffolds. Tissue Engineering - Part A, 2009, 15, 3655-3668.	1.6	45
83	Self-hardening calcium deficient hydroxyapatite/gelatine foams for bone regeneration. Journal of Materials Science: Materials in Medicine, 2010, 21, 863-869.	1.7	45
84	Additive electrospraying: a route to process electrospun scaffolds for controlled molecular release. Polymers for Advanced Technologies, 2015, 26, 1359-1369.	1.6	45
85	Effects on growth and osteogenic differentiation of mesenchymal stem cells by the strontium-added solâ€“gel hydroxyapatite gel materials. Journal of Materials Science: Materials in Medicine, 2015, 26, 90.	1.7	44
86	Induction of directional sprouting angiogenesis by matrix gradients. Journal of Biomedical Materials Research - Part A, 2007, 80A, 297-305.	2.1	43
87	Response of intestinal cells and macrophages to an orally administered cellulose-PEG based polymer as a potential treatment for intractable edemas. Biomaterials, 2005, 26, 4101-4110.	5.7	42
88	Biomimetic Strategies for Bone Repair and Regeneration. Journal of Functional Biomaterials, 2012, 3, 688-705.	1.8	41
89	Preparation and characterization of cellulose-based foams via microwave curing. Interface Focus, 2014, 4, 20130053.	1.5	41
90	Antimicrobial Imidazolium Ionic Liquids for the Development of Minimal Invasive Calcium Phosphate-Based Bionanocomposites. ACS Applied Materials & Interfaces, 2018, 10, 42766-42776.	4.0	41

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91	A degradable soybean-based biomaterial used effectively as a bone filler in vivo in a rabbit. Biomedical Materials (Bristol), 2010, 5, 015008.	1.7	40
92	Osteoinductive and anti-inflammatory properties of chitosan-based scaffolds for bone regeneration. Materials Science and Engineering C, 2019, 105, 110046.	3.8	40
93	Image processing and fractal box counting: user-assisted method for multi-scale porous scaffold characterization. Journal of Materials Science: Materials in Medicine, 2010, 21, 3109-3118.	1.7	39
94	Proliferation and Osteoblastic Differentiation of hMSCs on Cellulose-Based Hydrogels. Journal of Applied Biomaterials and Functional Materials, 2012, 10, 302-307.	0.7	39
95	Polycaprolactone/fluoride substituted-hydroxyapatite (PCL/FHA) nanocomposite coatings prepared by in-situ sol-gel process for dental implant applications. Progress in Organic Coatings, 2020, 147, 105873.	1.9	39
96	Syndiotactic Polystyrene Films with Sulfonated Amorphous Phase and Nanoporous Crystalline Phase. Chemistry of Materials, 2009, 21, 3191-3196.	3.2	38
97	Spontaneous arrangement of a tumor targeting hyaluronic acid shell on irinotecan loaded PLGA nanoparticles. Carbohydrate Polymers, 2016, 140, 400-407.	5.1	37
98	Behaviour of human mesenchymal stem cells on chemically synthesized HA-PCL scaffolds for hard tissue regeneration. Journal of Tissue Engineering and Regenerative Medicine, 2016, 10, E147-E154.	1.3	36
99	Some New Well-Posedness Results for Continuity and Transport Equations, and Applications to the Chromatography System. SIAM Journal on Mathematical Analysis, 2009, 41, 1890-1920.	0.9	35
100	The influence of Ni(II) on surface antigen expression in murine macrophages. Biomaterials, 2009, 30, 1492-1501.	5.7	34
101	5â€Azacytidineâ€mediated hMSC behavior on electrospun scaffolds for skeletal muscle regeneration. Journal of Biomedical Materials Research - Part A, 2017, 105, 2551-2561.	2.1	34
102	Well-Posedness for a Class of Hyperbolic Systems of Conservation Laws in Several Space Dimensions. Communications in Partial Differential Equations, 2005, 29, 1635-1651.	1.0	33
103	Gas-Barrier Hybrid Coatings by the Assembly of Novel Poly(vinyl alcohol) and Reduced Graphene Oxide Layers through Cross-Linking with Zirconium Adducts. ACS Applied Materials & Interfaces, 2015, 7, 22678-22685.	4.0	33
104	Mechanical behavior of bioactive poly(ethylene glycol) diacrylate matrices for biomedical application. Journal of the Mechanical Behavior of Biomedical Materials, 2020, 110, 103885.	1.5	33
105	Celluloseâ€based porous scaffold for bone tissue engineering applications: Assessment of h<scp>MSC</scp> proliferation and differentiation. Journal of Biomedical Materials Research - Part A, 2016, 104, 726-733.	2.1	32
106	Collagen density gradient on threeâ€dimensional printed poly(Îµâ€caprolactone) scaffolds for interface tissue engineering. Journal of Tissue Engineering and Regenerative Medicine, 2018, 12, 321-329.	1.3	32
107	Bioactive composites based on double network approach with tailored mechanical, physicoâ€chemical, and biological features. Journal of Biomedical Materials Research - Part A, 2018, 106, 3079-3089.	2.1	32
108	Micro- and nanocarriers by electrofludodynamic technologies for cell and molecular therapies. Process Biochemistry, 2016, 51, 2143-2154.	1.8	31

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109	A Combined Approach of Double Network Hydrogel and Nanocomposites Based on Hyaluronic Acid and Poly(ethylene glycol) Diacrylate Blend. Materials, 2018, 11, 2454.	1.3	31
110	Design of functional textile coatings via non-conventional electrofluidodynamic processes. Journal of Colloid and Interface Science, 2019, 541, 367-375.	5.0	31
111	MgCHA particles dispersion in porous PCL scaffolds:in vitromineralization andin vivobone formation. Journal of Tissue Engineering and Regenerative Medicine, 2014, 8, 291-303.	1.3	30
112	Rectifiability of Sets of Finite Perimeter in Carnot Groups: Existence of a Tangent Hyperplane. Journal of Geometric Analysis, 2009, 19, 509-540.	0.5	29
113	Electrospun polycaprolactone nanofibres decorated by drug loaded chitosan nano-reservoirs for antibacterial treatments. Nanotechnology, 2017, 28, 505103.	1.3	29
114	Injectable strontium-doped hydroxyapatite integrated with phosphoserine-tethered poly(epsilon-lysine) dendrons for osteoporotic bone defect repair. Journal of Materials Chemistry B, 2018, 6, 7974-7984.	2.9	29
115	Mechanical and leakage behaviour of the dentin â€“ adhesive interface. Journal of Materials Science: Materials in Medicine, 2004, 15, 485-492.	1.7	28
116	Effect of microencapsulated phase change materials on the thermo-mechanical properties of poly(methyl-methacrylate) based biomaterials. Journal of Materials Science: Materials in Medicine, 2006, 17, 1219-1226.	1.7	28
117	Semiclassical limit of quantum dynamics with rough potentials and wellâ€posedness of transport equations with measure initial data. Communications on Pure and Applied Mathematics, 2011, 64, 1199-1242.	1.2	28
118	Design of injectable organicâ€“inorganic hybrid for bone tissue repair. Journal of Biomedical Materials Research - Part A, 2012, 100A, 2063-2070.	2.1	28
119	Monolithic Polymeric Aerogels with VOCs Sorbent Nanoporous Crystalline and Water Sorbent Amorphous Phases. ACS Applied Materials & Interfaces, 2015, 7, 1318-1326.	4.0	28
120	The role of the surface on microglia function: implications for central nervous system tissue engineering. Journal of the Royal Society Interface, 2015, 12, 20141224.	1.5	28
121	Functional Biomolecule Delivery Systems and Bioengineering in Cartilage Regeneration. Current Pharmaceutical Biotechnology, 2019, 20, 32-46.	0.9	28
122	Hydrogel-based delivery of Tat-fused protein Hsp70 protects dopaminergic cells in vitro and in a mouse model of Parkinsonâ€™s disease. NPG Asia Materials, 2019, 11, .	3.8	28
123	Zn-substituted Mg2SiO4 nanoparticles-incorporated PCL-silk fibroin composite scaffold: A multifunctional platform towards bone tissue regeneration. Materials Science and Engineering C, 2021, 127, 112242.	3.8	28
124	Bioactivity and bone healing properties of biomimetic porous composite scaffold: In vitro and in vivo studies. Journal of Biomedical Materials Research - Part A, 2015, 103, 2932-2941.	2.1	27
125	Exosomes of mesenchymal stem cells delivered from methacrylated hyaluronic acid patch improve the regenerative properties of endothelial and dermal cells. , 2022, 139, 213000.		27
126	Electrofluidodynamics: exploring a new toolbox to design biomaterials for tissue regeneration and degeneration. Nanomedicine, 2016, 11, 1515-1518.	1.7	26

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127	Structural and functional properties of astrocytes on PCL based electrospun fibres. Materials Science and Engineering C, 2021, 118, 111363.	3.8	26
128	Biodegradable Microparticles and Nanoparticles by Electrospraying Techniques. Journal of Applied Biomaterials and Functional Materials, 2012, 10, 191-196.	0.7	25
129	Glucosamine grafting on poly(Îµ-caprolactone): a novel glycated polyester as a substrate for tissue engineering. RSC Advances, 2013, 3, 6286.	1.7	25
130	Hydrogel-Based Nanocomposites and Mesenchymal Stem Cells: A Promising Synergistic Strategy for Neurodegenerative Disorders Therapy. Scientific World Journal, The, 2013, 2013, 1-9.	0.8	25
131	Viscoelastic Properties of Rapid Prototyped Magnetic Nanocomposite Scaffolds for Osteochondral Tissue Regeneration. Procedia CIRP, 2016, 49, 76-82.	1.0	25
132	Poly(2-hydroxyethyl methacrylate)/Poly(caprolactone) Semi-Interpenetrating Polymer Networks. Journal of Bioactive and Compatible Polymers, 1988, 3, 205-218.	0.8	24
133	The biocompatibility of silverâ€containing Na₂OÂ·CaOÂ·2SiO₂ glass prepared by solâ€“gel method: In vitro studies. Journal of Biomedical Materials Research - Part B Applied Biomaterials, 2010, 92B, 102-110.	1.6	24
134	Technical features and criteria in designing fiber-reinforced composite materials: from the aerospace and aeronautical field to biomedical applications. Journal of Applied Biomaterials and Biomechanics, 2011, 9, 151-163.	0.4	24
135	Galactose grafting on poly(Îµ-caprolactone) substrates for tissue engineering: a preliminary study. Carbohydrate Research, 2015, 405, 39-46.	1.1	24
136	Bioactive chitosanâ€based scaffolds with improved properties induced by dextranâ€grafted nanoâ€maghemite and <scp>l</scp>â€arginine amino acid. Journal of Biomedical Materials Research - Part A, 2019, 107, 1244-1252.	2.1	24
137	Self-associating cellulose-graft-poly(Îµ-caprolactone) to design nanoparticles for drug release. Materials Science and Engineering C, 2020, 108, 110385.	3.8	24
138	Design of electrospayed non-spherical poly (l-lactide-co-glicolide) microdevices for sustained drug delivery. Journal of Materials Science: Materials in Medicine, 2014, 25, 383-390.	1.7	23
139	Chitosan Microgels and Nanoparticles via Electrofluidodynamic Techniques for Biomedical Applications. Gels, 2016, 2, 2.	2.1	23
140	Electrospun PCL-Based Vascular Grafts: In Vitro Tests. Nanomaterials, 2021, 11, 751.	1.9	23
141	Chitosan/hydroxyapatite nanocomposite scaffolds to modulate osteogenic and inflammatory response. Journal of Biomedical Materials Research - Part A, 2022, 110, 266-272.	2.1	23
142	Mechanical strength of tooth fragment reattachment. Journal of Biomedical Materials Research Part B, 2001, 55, 629-636.	3.0	22
143	Hyaluronan-coated nanoparticles for active tumor targeting: Influence of polysaccharide molecular weight on cell uptake. Colloids and Surfaces B: Biointerfaces, 2022, 210, 112240.	2.5	22
144	Osteogenic differentiation and mineralization in fibre-reinforced tubular scaffolds: theoretical study and experimental evidences. Journal of the Royal Society Interface, 2012, 9, 2201-2212.	1.5	21

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145	Binary system thermodynamics to control pore architecture of PCL scaffold via temperature-driven phase separation process. Journal of Biomaterials Applications, 2012, 27, 241-254.	1.2	21
146	In silico evaluation of a new composite disc substitute with a L3â€“L5 lumbar spine finite element model. European Spine Journal, 2012, 21, 675-687.	1.0	21
147	Synthesis and Characterization of Soybean-Based Hydrogels with an Intrinsic Activity on Cell Differentiation. Tissue Engineering - Part A, 2012, 18, 1932-1939.	1.6	20
148	Poly(Epsilon-Lysine) Dendrons Tethered with Phosphoserine Increase Mesenchymal Stem Cell Differentiation Potential of Calcium Phosphate Gels. Tissue Engineering - Part A, 2014, 20, 140116074603009.	1.6	20
149	Perimeter as relaxed Minkowski content in metric measure spaces. Nonlinear Analysis: Theory, Methods & Applications, 2017, 153, 78-88.	0.6	20
150	Graphene-based masterbatch obtained via modified polyvinyl alcohol liquid-shear exfoliation and its application in enhanced polymer composites. Materials and Design, 2017, 134, 103-110.	3.3	20
151	Eumelanin Coated PLA Electrospun Micro Fibers as Bioinspired Cradle for SH-SY5Y Neuroblastoma Cells Growth and Maturation. ACS Applied Materials & Interfaces, 2017, 9, 40070-40076.	4.0	20
152	Calorimetric and Thermomechanical Properties of Titanium-Based Orthodontic Wires: DSCâ€“DMA Relationship to Predict the Elastic Modulus. Journal of Biomaterials Applications, 2012, 26, 829-844.	1.2	19
153	Effect of Surface Fluorination of TiO₂ Particles on Photocatalitytic Activity of a Hybrid Multilayer Coating Obtained by Sol-Gel Method. ACS Applied Materials & Interfaces, 2012, 4, 150-157.	4.0	19
154	Bio-safe processing of polylactic-co-caprolactone and polylactic acid blends to fabricate fibrous porous scaffolds for in vitro mesenchymal stem cells adhesion and proliferation. Materials Science and Engineering C, 2016, 63, 512-521.	3.8	19
155	High Amorphous Vinyl Alcohol-Silica Bionanocomposites: Tuning Interface Interactions with Ionic Liquids. ACS Sustainable Chemistry and Engineering, 2017, 5, 1094-1105.	3.2	19
156	Rigidity of the 1-Bakryâ€“Ã‰mery Inequality and Sets of Finite Perimeter in RCD Spaces. Geometric and Functional Analysis, 2019, 29, 949-1001.	0.6	19
157	Reverse engineering of mandible and prosthetic framework: Effect of titanium implants in conjunction with titanium milled full arch bridge prostheses on the biomechanics of the mandible. Journal of Biomechanics, 2014, 47, 3825-3829.	0.9	18
158	Ionic liquids as dynamic templating agents for solâ€“gel silica systems: synergistic anion and cation effect on the silica structured growth. Journal of Sol-Gel Science and Technology, 2015, 76, 414-427.	1.1	18
159	Scanning Small- and Wide-Angle X-ray Scattering Microscopy Selectively Probes HA Content in Gelatin/Hydroxyapatite Scaffolds for Osteochondral Defect Repair. ACS Applied Materials & Interfaces, 2016, 8, 8728-8736.	4.0	18
160	Short-Term Degradation of Bi-Component Electrospun Fibers: Qualitative and Quantitative Evaluations via AFM Analysis. Journal of Functional Biomaterials, 2018, 9, 27.	1.8	18
161	Effect of Hyaluronic Acid on the Differentiation of Mesenchymal Stem Cells into Mature Type II Pneumocytes. Polymers, 2021, 13, 2928.	2.0	18
162	Weak differentiability of BV functions on stratified groups. Mathematische Zeitschrift, 2003, 245, 123-153.	0.4	17

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