

# jake e Barralet

## List of Publications by Year in descending order

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179  
papers

11,462  
citations

20817  
60  
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32842  
100  
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181  
all docs

181  
docs citations

181  
times ranked

10987  
citing authors

#	ARTICLE	IF	CITATIONS
1	Technological issues for the development of more efficient calcium phosphate bone cements: A critical assessment. <i>Biomaterials</i> , 2005, 26, 6423-6429.	11.4	376
2	Bioinorganics and biomaterials: Bone repair. <i>Acta Biomaterialia</i> , 2011, 7, 3013-3026.	8.3	364
3	Dicalcium phosphate cements: Brushite and monetite. <i>Acta Biomaterialia</i> , 2012, 8, 474-487.	8.3	352
4	Genipin-crosslinked catechol-chitosan mucoadhesive hydrogels for buccal drug delivery. <i>Biomaterials</i> , 2015, 37, 395-404.	11.4	334
5	Evaluation of sodium alginate for bone marrow cell tissue engineering. <i>Biomaterials</i> , 2003, 24, 3475-3481.	11.4	315
6	Osteoconduction and osteoinduction of low-temperature 3D printed bioceramic implants. <i>Biomaterials</i> , 2008, 29, 944-953.	11.4	311
7	The stimulation of angiogenesis and collagen deposition by copper. <i>Biomaterials</i> , 2010, 31, 824-831.	11.4	304
8	Precipitation casting of polycaprolactone for applications in tissue engineering and drug delivery. <i>Biomaterials</i> , 2004, 25, 315-325.	11.4	303
9	Carbonate substitution in precipitated hydroxyapatite: An investigation into the effects of reaction temperature and bicarbonate ion concentration. , 1998, 41, 79-86.		229
10	Resorbable Dicalcium Phosphate Bone Substitutes Prepared by 3D Powder Printing. <i>Advanced Functional Materials</i> , 2007, 17, 3940-3945.	14.9	218
11	Angiogenesis in Calcium Phosphate Scaffolds by Inorganic Copper Ion Release. <i>Tissue Engineering - Part A</i> , 2009, 15, 1601-1609.	3.1	204
12	Preparation of macroporous calcium phosphate cement tissue engineering scaffold. <i>Biomaterials</i> , 2002, 23, 3063-3072.	11.4	195
13	Ionic modification of calcium phosphate cement viscosity. Part I: hypodermic injection and strength improvement of apatite cement. <i>Biomaterials</i> , 2004, 25, 2187-2195.	11.4	195
14	Low temperature direct 3D printed bioceramics and biocomposites as drug release matrices. <i>Journal of Controlled Release</i> , 2007, 122, 173-180.	9.9	185
15	Accelerated mineralization of dense collagen-nano bioactive glass hybrid gels increases scaffold stiffness and regulates osteoblastic function. <i>Biomaterials</i> , 2011, 32, 8915-8926.	11.4	176
16	Mechanical activation and cement formation of $\beta$ -tricalcium phosphate. <i>Biomaterials</i> , 2003, 24, 4123-4131.	11.4	165
17	Silver-doped calcium phosphate cements with antimicrobial activity. <i>Acta Biomaterialia</i> , 2011, 7, 4064-4070.	8.3	162
18	Ionic modification of calcium phosphate cement viscosity. Part II: hypodermic injection and strength improvement of brushite cement. <i>Biomaterials</i> , 2004, 25, 2197-2203.	11.4	155

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19	3D Powder Printing of $\beta$ -Tricalcium Phosphate Ceramics Using Different Strategies. <i>Advanced Engineering Materials</i> , 2008, 10, B67.	3.5	152
20	Biocompatibility of magnesium phosphate minerals and their stability under physiological conditions. <i>Acta Biomaterialia</i> , 2011, 7, 2678-2685.	8.3	145
21	Three-Dimensional Mineralization of Dense Nanofibrillar Collagen $\alpha$ 1(BI) Bioglass Hybrid Scaffolds. <i>Biomacromolecules</i> , 2010, 11, 1470-1479.	5.4	142
22	In vitro ageing of brushite calcium phosphate cement. <i>Biomaterials</i> , 2003, 24, 4133-4141.	11.4	139
23	High-strength resorbable brushite bone cement with controlled drug-releasing capabilities. <i>Acta Biomaterialia</i> , 2009, 5, 43-49.	8.3	137
24	Interferon- $\beta$ plays a role in bone formation in vivo and rescues osteoporosis in ovariectomized mice. <i>Journal of Bone and Mineral Research</i> , 2011, 26, 1472-1483.	2.8	133
25	Direct Printing of Bioceramic Implants with Spatially Localized Angiogenic Factors. <i>Advanced Materials</i> , 2007, 19, 795-800.	21.0	132
26	Mucoadhesive chitosan hydrogels as rectal drug delivery vessels to treat ulcerative colitis. <i>Acta Biomaterialia</i> , 2017, 48, 247-257.	8.3	129
27	Ion adsorption behaviour of hydroxyapatite with different crystallinities. <i>Colloids and Surfaces B: Biointerfaces</i> , 2009, 74, 91-95.	5.0	128
28	Craniofacial vertical bone augmentation: A comparison between 3D printed monolithic monetite blocks and autologous onlay grafts in the rabbit. <i>Biomaterials</i> , 2009, 30, 6318-6326.	11.4	128
29	Influence of calcium phosphate crystal assemblies on the proliferation and osteogenic gene expression of rat bone marrow stromal cells. <i>Biomaterials</i> , 2007, 28, 1393-1403.	11.4	119
30	Silk fibroin derived polypeptide-induced biomineralization of collagen. <i>Biomaterials</i> , 2012, 33, 102-108.	11.4	118
31	Resorption of monetite granules in alveolar bone defects in human patients. <i>Biomaterials</i> , 2010, 31, 2762-2769.	11.4	111
32	The effect of autoclaving on the physical and biological properties of dicalcium phosphate dihydrate bioceramics: Brushite vs. monetite. <i>Acta Biomaterialia</i> , 2012, 8, 3161-3169.	8.3	109
33	Passive and Active <i>In Vitro</i> Resorption of Calcium and Magnesium Phosphate Cements by Osteoclastic Cells. <i>Tissue Engineering - Part A</i> , 2010, 16, 3687-3695.	3.1	108
34	Comparison of bone marrow cell growth on 2D and 3D alginate hydrogels. <i>Journal of Materials Science: Materials in Medicine</i> , 2005, 16, 515-519.	3.6	104
35	Thermal decomposition of synthesised carbonate hydroxyapatite. <i>Journal of Materials Science: Materials in Medicine</i> , 2002, 13, 529-533.	3.6	98
36	In vitro biodegradation of three brushite calcium phosphate cements by a macrophage cell-line. <i>Biomaterials</i> , 2006, 27, 4557-4565.	11.4	94

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37	Brushiteâ€“collagen composites for bone regeneration. Acta Biomaterialia, 2008, 4, 1315-1321.	8.3	94
38	High-Strength Apatitic Cement by Modification with $\beta$ -Hydroxy Acid Salts. Advanced Materials, 2003, 15, 2091-2094.	21.0	93
39	Bone marrow cell gene expression and tissue construct assembly using octacalcium phosphate microscaffolds. Biomaterials, 2006, 27, 2874-2881.	11.4	93
40	Osseointegration of dental implants in 3D-printed synthetic onlay grafts customized according to bone metabolic activity in recipient site. Biomaterials, 2014, 35, 5436-5445.	11.4	92
41	Simultaneous Immobilization of Bioactives During 3D Powder Printing of Bioceramic Drugâ€“Release Matrices. Advanced Functional Materials, 2010, 20, 1585-1591.	14.9	89
42	Mollusk Glue Inspired Mucoadhesives for Biomedical Applications. Langmuir, 2012, 28, 14010-14017.	3.5	84
43	The importance of particle size and DNA condensation salt for calcium phosphate nanoparticle transfection. Biomaterials, 2008, 29, 3384-3392.	11.4	82
44	Biologically mediated resorption of brushite cement in vitro. Biomaterials, 2006, 27, 2178-2185.	11.4	81
45	Phase composition, mechanical performance and in vitro biocompatibility of hydraulic setting calcium magnesium phosphate cement. Acta Biomaterialia, 2010, 6, 1529-1535.	8.3	80
46	Bioinorganics and Wound Healing. Advanced Healthcare Materials, 2019, 8, e1900764.	7.6	80
47	Preparation of tricalcium phosphate/calcium pyrophosphate structures via rapid prototyping. Journal of Materials Science: Materials in Medicine, 2008, 19, 1559-1563.	3.6	79
48	Influence of powder/liquid mixing ratio on the performance of a restorative glass-ionomer dental cement. Biomaterials, 2003, 24, 4173-4179.	11.4	78
49	Modification of Calcium Phosphate Cement with $\beta$ -Hydroxy Acids and Their Salts. Chemistry of Materials, 2005, 17, 1313-1319.	6.7	77
50	The effect of amorphous pyrophosphate on calcium phosphate cement resorption and bone generation. Biomaterials, 2013, 34, 6631-6637.	11.4	77
51	Strontium modified biocements with zero order release kinetics. Biomaterials, 2008, 29, 4691-4697.	11.4	76
52	Effect of sintering parameters on the density and microstructure of carbonate hydroxyapatite. Journal of Materials Science: Materials in Medicine, 2000, 11, 719-724.	3.6	73
53	In vitro degradation and in vivo resorption of dicalcium phosphate cement based grafts. Acta Biomaterialia, 2015, 26, 338-346.	8.3	72
54	Factors influencing calcium phosphate cement shelf-life. Biomaterials, 2005, 26, 3691-3697.	11.4	71

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55	Modeling vancomycin release kinetics from microporous calcium phosphate ceramics comparing static and dynamic immersion conditions. <i>Acta Biomaterialia</i> , 2008, 4, 1480-1486.	8.3	71
56	FTIR-monitoring of a fast setting brushite bone cement: effect of intermediate phases. <i>Journal of Materials Chemistry</i> , 2006, 16, 3199.	6.7	70
57	Collagen Biomineralization In Vivo by Sustained Release of Inorganic Phosphate Ions. <i>Advanced Materials</i> , 2010, 22, 1858-1862.	21.0	70
58	Vertical bone augmentation with 3D-synthetic monetite blocks in the rabbit calvaria. <i>Journal of Clinical Periodontology</i> , 2011, 38, 1147-1153.	4.9	68
59	Cement from magnesium substituted hydroxyapatite. <i>Journal of Materials Science: Materials in Medicine</i> , 2005, 16, 455-460.	3.6	66
60	Amorphous $\beta$ -tricalcium Phosphate: Preparation and Aqueous Setting Reaction. <i>Journal of the American Ceramic Society</i> , 2004, 87, 1126-1132.	3.8	64
61	Whisker-Reinforced Calcium Phosphate Cements. <i>Journal of the American Ceramic Society</i> , 2007, 90, 3694-3697.	3.8	64
62	Minimally invasive maxillofacial vertical bone augmentation using brushite based cements. <i>Biomaterials</i> , 2009, 30, 208-216.	11.4	61
63	Two-Dimensional Magnesium Phosphate Nanosheets Form Highly Thixotropic Gels That Up-Regulate Bone Formation. <i>Nano Letters</i> , 2016, 16, 4779-4787.	9.1	60
64	Hypoxia signalling manipulation for bone regeneration. <i>Expert Reviews in Molecular Medicine</i> , 2015, 17, e6.	3.9	59
65	Hydrocaffeic acid-chitosan nanoparticles with enhanced stability, mucoadhesion and permeation properties. <i>European Journal of Pharmaceutics and Biopharmaceutics</i> , 2014, 88, 1026-1037.	4.3	58
66	Pore network modeling of reaction-diffusion in hierarchical porous particles: The effects of microstructure. <i>Chemical Engineering Journal</i> , 2017, 330, 1002-1011.	12.7	58
67	Cements from nanocrystalline hydroxyapatite. <i>Journal of Materials Science: Materials in Medicine</i> , 2004, 15, 407-411.	3.6	57
68	Rheological enhancement of mechanically activated $\beta$ -tricalcium phosphate cements. <i>Journal of Biomedical Materials Research - Part B Applied Biomaterials</i> , 2005, 73B, 1-6.	3.4	56
69	Temperature dependent setting kinetics and mechanical properties of $\beta$ -TCP-pyrophosphoric acid bone cement. <i>Journal of Materials Chemistry</i> , 2005, 15, 4955.	6.7	56
70	Elucidating the individual effects of calcium and phosphate ions on hMSCs by using composite materials. <i>Acta Biomaterialia</i> , 2015, 17, 1-15.	8.3	56
71	Effects of fibre reinforcement on the mechanical properties of brushite cement. <i>Acta Biomaterialia</i> , 2006, 2, 95-102.	8.3	55
72	Characterization of chlorhexidine-releasing, fast-setting, brushite bone cements. <i>Acta Biomaterialia</i> , 2008, 4, 1081-1088.	8.3	51

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73	Antimicrobial potency of alkali ion substituted calcium phosphate cements. <i>Biomaterials</i> , 2005, 26, 6880-6886.	11.4	49
74	The use of RANKL-coated brushite cement to stimulate bone remodelling. <i>Biomaterials</i> , 2008, 29, 3253-3259.	11.4	48
75	Melatonin Dietary Supplement as an Anti-Aging Therapy for Age-Related Bone Loss. <i>Rejuvenation Research</i> , 2014, 17, 341-346.	1.8	47
76	Exploring the Impact of Electrode Microstructure on Redox Flow Battery Performance Using a Multiphysics Pore Network Model. <i>Journal of the Electrochemical Society</i> , 2019, 166, A2121-A2130.	2.9	44
77	Mechanical Activation of Tetracalcium Phosphate. <i>Journal of the American Ceramic Society</i> , 2004, 87, 311-313.	3.8	43
78	Surfactant vesicle-mediated delivery of DNA vaccines via the subcutaneous route. <i>International Journal of Pharmaceutics</i> , 2004, 284, 31-41.	5.2	42
79	Osteopontin functions as an opsonin and facilitates phagocytosis by macrophages of hydroxyapatite-coated microspheres: Implications for bone wound healing. <i>Bone</i> , 2008, 43, 708-716.	2.9	42
80	Regulation of Osteoclast Growth and Fusion by mTOR/raptor and mTOR/ric1tor/Akt. <i>Frontiers in Cell and Developmental Biology</i> , 2017, 5, 54.	3.7	42
81	Resveratrol As Anti-Aging Therapy for Age-Related Bone Loss. <i>Rejuvenation Research</i> , 2014, 17, 439-445.	1.8	41
82	Newly identified interfibrillar collagen crosslinking suppresses cell proliferation and remodelling. <i>Biomaterials</i> , 2015, 54, 126-135.	11.4	41
83	Tissue Engineering of Human Biliary Epithelial Cells on Polyglycolic Acid/Polycaprolactone Scaffolds Maintains Long-Term Phenotypic Stability. <i>Tissue Engineering</i> , 2003, 9, 1037-1045.	4.6	40
84	Fibril formation pH controls intrafibrillar collagen biomineralization inÂvitro and inÂvivo. <i>Biomaterials</i> , 2015, 37, 252-259.	11.4	40
85	Top-down bottom-up graphene synthesis. <i>Nano Futures</i> , 2019, 3, 042003.	2.2	39
86	Ascorbic acid accelerates osteoclast formation and death. <i>Bone</i> , 2010, 46, 1336-1343.	2.9	38
87	Cement from nanocrystalline hydroxyapatite: Effect of calcium phosphate ratio. <i>Journal of Materials Science: Materials in Medicine</i> , 2005, 16, 1185-1190.	3.6	37
88	Mimicking oxygen delivery and waste removal functions of blood. <i>Advanced Drug Delivery Reviews</i> , 2017, 122, 84-104.	13.7	37
89	Formation of translucent hydroxyapatite ceramics by sintering in carbon dioxide atmospheres. <i>Journal of Materials Science</i> , 2003, 38, 3979-3993.	3.7	36
90	Synthesis and Structure of a Calcium Polyphosphate with a Unique Criss-Cross Arrangement of Helical Phosphate Chains. <i>Chemistry of Materials</i> , 2005, 17, 4642-4646.	6.7	36

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91	Cement Formulations in the Calcium Phosphate H <sub>2</sub> O-H <sub>3</sub> PO <sub>4</sub> -H <sub>4</sub> P <sub>2</sub> O <sub>7</sub> System. Journal of the American Ceramic Society, 2005, 88, 3096-3103.	3.8	35
92	Effect of processing conditions of dicalcium phosphate cements on graft resorption and bone formation. Acta Biomaterialia, 2017, 53, 526-535.	8.3	35
93	Alkali ion substituted calcium phosphate cement formation from mechanically activated reactants. Journal of Materials Science: Materials in Medicine, 2005, 16, 423-427.	3.6	34
94	Real-time monitoring of the setting reaction of brushite-forming cement using isothermal differential scanning calorimetry. Journal of Biomedical Materials Research - Part B Applied Biomaterials, 2006, 79B, 360-364.	3.4	34
95	Collagen gel fibrillar density dictates the extent of mineralization in vitro. Soft Matter, 2011, 7, 9898.	2.7	34
96	In vitro transfer of keratinocytes: Comparison of transfer from fibrin membrane and delivery by aerosol spray. Journal of Biomedical Materials Research - Part B Applied Biomaterials, 2005, 73B, 221-228.	3.4	33
97	Mesenchymal stem cell-seeded multilayered dense collagen-silk fibroin hybrid for tissue engineering applications. Biotechnology Journal, 2011, 6, 1198-1207.	3.5	33
98	In vitro behavior of albumin-loaded carbonate hydroxyapatite gel. Journal of Biomedical Materials Research Part B, 2002, 60, 360-367.	3.1	31
99	Nanocrystalline Tetracalcium Phosphate Cement. Journal of Dental Research, 2004, 83, 425-428.	5.2	31
100	Amphiphilic peptide-loaded nanofibrous calcium phosphate microspheres promote hemostasis in vivo. Acta Biomaterialia, 2013, 9, 9194-9200.	8.3	31
101	Biomaterial-stabilized Soft Tissue Healing for Healing of Critical-sized Bone Defects: the Masquelet Technique. Advanced Healthcare Materials, 2016, 5, 630-640.	7.6	31
102	Improving peptide-based assays to differentiate between vaccination and Mycobacterium bovis infection in cattle using nanoparticle carriers for adsorbed antigens. Journal of Controlled Release, 2005, 102, 551-561.	9.9	30
103	Magnesium-sputtered titanium for the formation of bioactive coatings. Acta Biomaterialia, 2009, 5, 2338-2347.	8.3	30
104	<i>In vitro</i> antibacterial efficacy of tetracycline hydrochloride adsorbed onto Bio-Oss® bone graft. Journal of Biomedical Materials Research - Part B Applied Biomaterials, 2010, 93B, 394-400.	3.4	30
105	An airway smooth muscle cell niche under physiological pulsatile flow culture using a tubular dense collagen construct. Biomaterials, 2013, 34, 1954-1966.	11.4	29
106	Electropolymerized Carbonic Anhydrase Immobilization for Carbon Dioxide Capture. Langmuir, 2014, 30, 6915-6919.	3.5	28
107	Electrocatalytic Oxygen Reduction Performance of Silver Nanoparticle Decorated Electrochemically Exfoliated Graphene. Langmuir, 2015, 31, 9718-9727.	3.5	27
108	Dual-setting brushite-silica gel cements. Acta Biomaterialia, 2015, 11, 467-476.	8.3	27

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109	Controlling Bone Graft Substitute Microstructure to Improve Bone Augmentation. <i>Advanced Healthcare Materials</i> , 2016, 5, 1646-1655.	7.6	27
110	The optimisation of the initial viscosity of an encapsulated glass-ionomer restorative following different mechanical mixing regimes. <i>Journal of Dentistry</i> , 2006, 34, 155-163.	4.1	26
111	Chelate Bonding Mechanism in a Novel Magnesium Phosphate Bone Cement. <i>Journal of the American Ceramic Society</i> , 2015, 98, 694-697.	3.8	26
112	Hypoxia Biomimicry to Enhance Monetite Bone Defect Repair. <i>Tissue Engineering - Part A</i> , 2017, 23, 1372-1381.	3.1	26
113	Stabilization of Amorphous Calcium Carbonate with Nanofibrillar Biopolymers. <i>Advanced Functional Materials</i> , 2012, 22, 3460-3469.	14.9	25
114	A pilot study: Alternative biomaterials in critical sized bone defect treatment. <i>Injury</i> , 2018, 49, 523-531.	1.7	25
115	Chemical characterization of a degradable polymeric bone adhesive containing hydrolysable fillers and interpretation of anomalous mechanical properties. <i>Acta Biomaterialia</i> , 2009, 5, 2072-2083.	8.3	24
116	Skeletal regeneration for segmental bone loss: Vascularised grafts, analogues and surrogates. <i>Acta Biomaterialia</i> , 2021, 136, 37-55.	8.3	24
117	Frozen delivery of brushite calcium phosphate cements. <i>Acta Biomaterialia</i> , 2008, 4, 1916-1923.	8.3	22
118	Phytic acid as alternative setting retarder enhanced biological performance of dicalcium phosphate cement in vitro. <i>Scientific Reports</i> , 2017, 7, 558.	3.3	22
119	Local delivery of iron chelators reduces in vivo remodeling of a calcium phosphate bone graft substitute. <i>Acta Biomaterialia</i> , 2016, 42, 411-419.	8.3	20
120	Perfluorodecalin and bone regeneration. , 2013, 25, 22-36.		20
121	Dynamic shrinkage behavior of hydroxyapatite and glass-reinforced hydroxyapatites. <i>Journal of Materials Science</i> , 2004, 39, 2205-2208.	3.7	19
122	Modified PMMA cements for a hydrolysis resistant metal-polymer interface in orthopaedic applications. <i>Acta Biomaterialia</i> , 2005, 1, 671-676.	8.3	19
123	Aqueous decomposition behavior of solid peroxides: Effect of pH and buffer composition on oxygen and hydrogen peroxide formation. <i>Acta Biomaterialia</i> , 2022, 145, 390-402.	8.3	19
124	Antimicrobial properties of nanocrystalline tetracalcium phosphate cements. <i>Journal of Biomedical Materials Research - Part B Applied Biomaterials</i> , 2007, 83B, 132-137.	3.4	18
125	Reproducible quantification of osteoclastic activity: Characterization of a biomimetic calcium phosphate assay. <i>Journal of Biomedical Materials Research - Part B Applied Biomaterials</i> , 2014, 102, 903-912.	3.4	18
126	In vitro ion adsorption and cytocompatibility of dicalcium phosphate ceramics. <i>Biomaterials Research</i> , 2017, 21, 10.	6.9	18



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127	The Effects of Crystal Phase and Particle Morphology of Calcium Phosphates on Proliferation and Differentiation of Human Mesenchymal Stromal Cells. <i>Advanced Healthcare Materials</i> , 2016, 5, 1775-1785.	7.6	17
128	Development of Highly Functional Biomaterials by Decoupling and Recombining Material Properties. <i>Advanced Materials</i> , 2016, 28, 1803-1808.	21.0	17
129	Serum Protein Controlled Nanoparticle Synthesis. <i>Advanced Functional Materials</i> , 2011, 21, 2968-2977.	14.9	16
130	Moderate excess of pyruvate augments osteoclastogenesis. <i>Biology Open</i> , 2013, 2, 387-395.	1.2	16
131	Silk fibroin hydroxyapatite composite thermal stabilisation of carbonic anhydrase. <i>Journal of Materials Chemistry A</i> , 2015, 3, 19282-19287.	10.3	16
132	Material-Induced Venosome-Supported Bone Tubes. <i>Advanced Science</i> , 2019, 6, 1900844.	11.2	16
133	Dispersion modeling in pore networks: A comparison of common pore-scale models and alternative approaches. <i>Journal of Contaminant Hydrology</i> , 2020, 228, 103578.	3.3	16
134	Bioactivity of bone resorptive factor loaded on osteoconductive matrices: Stability post-dehydration. <i>European Journal of Pharmaceutics and Biopharmaceutics</i> , 2008, 70, 813-818.	4.3	15
135	Chelate setting of alkali ion substituted calcium phosphates. <i>Ceramics International</i> , 2015, 41, 10010-10017.	4.8	15
136	Tailoring Carbon Nanotube Microsphere Architectures with Controlled Porosity. <i>Advanced Functional Materials</i> , 2019, 29, 1903983.	14.9	15
137	Influence of calcium phosphate crystal morphology on the adhesion, spreading, and growth of bone derived cells. <i>Journal of Biomedical Materials Research - Part A</i> , 2009, 90A, 972-980.	4.0	14
138	Electrically Bloomed Platinum Nanoflowers on Exfoliated Graphene: An Efficient Alcohol Oxidation Catalyst. <i>Journal of the Electrochemical Society</i> , 2016, 163, D615-D621.	2.9	14
139	Composite Carbon Nanotube Microsphere Coatings for Use as Electrode Supports. <i>Advanced Functional Materials</i> , 2018, 28, 1803713.	14.9	14
140	Synthesis, characterization and properties of erbium-based nanofibres and nanorods. <i>Nanotechnology</i> , 2007, 18, 445606.	2.6	13
141	Brushite Cements from Polyphosphoric Acid, Calcium Phosphate Systems. <i>Journal of the American Ceramic Society</i> , 2007, 90, 1892-1898.	3.8	13
142	Intrinsic 3D Prestressing: A New Route for Increasing Strength and Improving Toughness of Hybrid Inorganic Biocements. <i>Advanced Materials</i> , 2017, 29, 1701035.	21.0	12
143	Ultrasonic Phosphate Bonding of Nanoparticles. <i>Advanced Materials</i> , 2013, 25, 5953-5958.	21.0	11
144	Electrically wired enzyme/TiO <sub>2</sub> composite for glucose detection. <i>Materials Science and Engineering C</i> , 2017, 76, 991-996.	7.3	11

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145	Thermal Performance of Mechanically Activated Tetracalcium Phosphate. Journal of the American Ceramic Society, 2005, 88, 1327-1330.	3.8	10
146	Cortical bone screw fixation in ionically modified apatite cements. Journal of Biomedical Materials Research - Part B Applied Biomaterials, 2005, 73B, 238-243.	3.4	10
147	Graphene modified nanosized Ag electrocomposites. Materials Research Bulletin, 2017, 89, 42-50.	5.2	10
148	The Role of the Air-Liquid Interface in Protein-Mediated Biomineralization of Calcium Carbonate. Crystal Growth and Design, 2011, 11, 803-810.	3.0	9
149	Low temperature fabrication of spherical brushite granules by cement paste emulsion. Journal of Materials Science: Materials in Medicine, 2012, 23, 2631-2637.	3.6	9
150	A new class of bioactive glasses: Calcium-magnesium sulfophosphates. Journal of Biomedical Materials Research - Part A, 2014, 102, 2842-2848.	4.0	9
151	Intra-tumor delivery of zoledronate mitigates metastasis-induced osteolysis superior to systemic administration. Journal of Bone Oncology, 2017, 6, 8-15.	2.4	9
152	Cavitation Mediated 3D Microstructured Architectures from Nanocarbon. Advanced Functional Materials, 2018, 28, 1706832.	14.9	9
153	Preservation of Blood Vessels with an Oxygen Generating Composite. Advanced Healthcare Materials, 2018, 7, e1701338.	7.6	8
154	Powerful amorphous mixed metal catalyst for efficient water-oxidation. Materials Today Energy, 2018, 9, 247-253.	4.7	8
155	The effect of hot pressing on the physical properties of glass reinforced hydroxyapatite. Journal of Materials Science: Materials in Medicine, 2004, 15, 705-710.	3.6	7
156	Hierarchical Stable Enzyme Microenvironments for High-Temperature Stability in Amine Solvents. Particle and Particle Systems Characterization, 2014, 31, 1091-1096.	2.3	7
157	Biomaterial-Induction of a Transplantable Angiosome. Advanced Functional Materials, 2020, 30, 1905115.	14.9	6
158	Sustained steroid release in pulmonary inflammation model. Biomaterials, 2010, 31, 6050-6059.	11.4	5
159	Treatment of Critical-Sized Calvarial Defects in Rats with Preimplanted Transplants. Advanced Healthcare Materials, 2019, 8, e1900722.	7.6	5
160	Best practices for enhancing surgical research: a perspective from the Canadian Association of Chairs of Surgical Research. Canadian Journal of Surgery, 2019, 62, 488-498.	1.2	5
161	2D hematene, a bioresorbable electrocatalytic support for glucose oxidation. 2D Materials, 2020, 7, 025044.	4.4	5
162	Characterization of biomimetic calcium phosphate labeled with fluorescent dextran for quantification of osteoclastic activity. Acta Biomaterialia, 2015, 20, 140-146.	8.3	4

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163	Effects of Oxygen and Glucose on Bone Marrow Mesenchymal Stem Cell Culture. <i>Advanced Biology</i> , 2020, 4, e2000094.	3.0	4
164	An approach to compare the quality of cancellous bone from the femoral necks of healthy and osteoporotic patients through compression testing and microcomputed tomography imaging. <i>McGill Journal of Medicine</i> , 2006, 9, 102-7.	0.1	4
165	Carvable calcium phosphate bone substitute material. <i>Journal of Biomedical Materials Research - Part B Applied Biomaterials</i> , 2007, 83B, 1-8.	3.4	3
166	Adhesion and Growth of Bone Marrow Stromal Cells on Modified Alginate Hydrogels. <i>Tissue Engineering</i> , 2004, 10, 1480-1491.	4.6	3
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