

Tomoyuki Kawase

List of Publications by Year in descending order

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105
papers

3,412
citations

186265

28
h-index

161849

54
g-index

106
all docs

106
docs citations

106
times ranked

2698
citing authors

#	ARTICLE	IF	CITATIONS
1	Platelet-Rich Plasma Contains High Levels of Platelet-Derived Growth Factor and Transforming Growth Factor- β 2 and Modulates the Proliferation of Periodontally Related Cells In Vitro. <i>Journal of Periodontology</i> , 2003, 74, 849-857.	3.4	319
2	Growth factor and pro-inflammatory cytokine contents in platelet-rich plasma (PRP), plasma rich in growth factors (PRGF), advanced platelet-rich fibrin (A-PRF), and concentrated growth factors (CGF). <i>International Journal of Implant Dentistry</i> , 2016, 2, 19.	2.7	263
3	Platelet-Rich Plasma Combined With a Porous Hydroxyapatite Graft for the Treatment of Intrabony Periodontal Defects in Humans: A Comparative Controlled Clinical Study. <i>Journal of Periodontology</i> , 2005, 76, 890-898.	3.4	192
4	Platelet-Rich Plasma-Derived Fibrin Clot Formation Stimulates Collagen Synthesis in Periodontal Ligament and Osteoblastic Cells In Vitro. <i>Journal of Periodontology</i> , 2003, 74, 858-864.	3.4	188
5	Enamel matrix derivative (EMDOGAIN [®]) rapidly stimulates phosphorylation of the MAP kinase family and nuclear accumulation of smad2 in both oral epithelial and fibroblastic human cells. <i>Journal of Periodontal Research</i> , 2001, 36, 367-376.	2.7	121
6	Tissue-Engineered Cultured Periosteum Used With Platelet-Rich Plasma and Hydroxyapatite in Treating Human Osseous Defects. <i>Journal of Periodontology</i> , 2008, 79, 811-818.	3.4	103
7	A proposed protocol for the standardized preparation of PRF membranes for clinical use. <i>Biologicals</i> , 2012, 40, 323-329.	1.4	100
8	Anti-TGF β 2 antibody blocks enamel matrix derivative-induced upregulation of p21 ^{WAF1/cip1} and prevents its inhibition of human oral epithelial cell proliferation. <i>Journal of Periodontal Research</i> , 2002, 37, 255-262.	2.7	89
9	Mechanical and degradation properties of advanced platelet-rich fibrin (A-PRF), concentrated growth factors (CGF), and platelet-poor plasma-derived fibrin (PPTF). <i>International Journal of Implant Dentistry</i> , 2017, 3, 17.	2.7	88
10	Cytostatic action of enamel matrix derivative (EMDOGAIN [®]) on human oral squamous cell carcinoma-derived SCC25 epithelial cells. <i>Journal of Periodontal Research</i> , 2000, 35, 291-300.	2.7	85
11	Platelet-rich plasma and its derivatives as promising bioactive materials for regenerative medicine: basic principles and concepts underlying recent advances. <i>Odontology / the Society of the Nippon Dental University</i> , 2015, 103, 126-135.	1.9	83
12	Use of platelet-rich fibrin for the treatment of periodontal intrabony defects: a systematic review and meta-analysis. <i>Clinical Oral Investigations</i> , 2021, 25, 2461-2478.	3.0	80
13	The heat-compression technique for the conversion of platelet-rich fibrin preparation to a barrier membrane with a reduced rate of biodegradation. , 2015, 103, 825-831.		77
14	A clinical study of alveolar bone tissue engineering with cultured autogenous periosteal cells: Coordinated activation of bone formation and resorption. <i>Bone</i> , 2012, 50, 1123-1129.	2.9	74
15	In Vitro Evidence That the Biological Effects of Platelet-Rich Plasma on Periodontal Ligament Cells Is Not Mediated Solely by Constituent Transforming-Growth Factor- β 2 or Platelet-Derived Growth Factor. <i>Journal of Periodontology</i> , 2005, 76, 760-767.	3.4	72
16	Analysis of intestinal fibrosis in chronic colitis in mice induced by dextran sulfate sodium. <i>Pathology International</i> , 2011, 61, 228-238.	1.3	61
17	Use of platelet-rich fibrin for the treatment of gingival recessions: a systematic review and meta-analysis. <i>Clinical Oral Investigations</i> , 2020, 24, 2543-2557.	3.0	49
18	Characterization of human cultured periosteal sheets expressing bone-forming potential: <i>in vitro</i> and <i>in vivo</i> animal studies. <i>Journal of Tissue Engineering and Regenerative Medicine</i> , 2009, 3, 218-229.	2.7	47

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19	Direct activation of platelets by addition of CaCl ₂ leads coagulation of platelet-rich plasma. <i>International Journal of Implant Dentistry</i> , 2018, 4, 23.	2.7	46
20	Human Periosteum-Derived Cells Combined With Superporous Hydroxyapatite Blocks Used as an Osteogenic Bone Substitute for Periodontal Regenerative Therapy: An Animal Implantation Study Using Nude Mice. <i>Journal of Periodontology</i> , 2010, 81, 420-427.	3.4	40
21	In vitro immunological and biological evaluations of the angiogenic potential of platelet-rich fibrin preparations: a standardized comparison with PRP preparations. <i>International Journal of Implant Dentistry</i> , 2015, 1, 31.	2.7	37
22	Bioactivity of freeze-dried platelet-rich plasma in an adsorbed form on a biodegradable polymer material. <i>Platelets</i> , 2012, 23, 594-603.	2.3	35
23	Calcitonin gene-related peptide acts as a mitogen for human Gin-1 gingival fibroblasts by activating the MAP kinase signalling pathway. <i>Journal of Periodontal Research</i> , 1999, 34, 160-168.	2.7	33
24	An improved freeze-dried PRP-coated biodegradable material suitable for connective tissue regenerative therapy. <i>Cryobiology</i> , 2013, 66, 223-232.	0.7	33
25	PLATELET-RICH PLASMA PROVIDES NUCLEUS FOR MINERALIZATION IN CULTURES OF PARTIALLY DIFFERENTIATED PERIODONTAL LIGAMENT CELLS. <i>In Vitro Cellular and Developmental Biology - Animal</i> , 2005, 41, 171.	1.5	32
26	Dual-Labeled Near-Infrared/ ^{99m} Tc Imaging Probes Using PAMAM-Coated Silica Nanoparticles for the Imaging of HER2-Expressing Cancer Cells. <i>International Journal of Molecular Sciences</i> , 2016, 17, 1086.	4.1	32
27	A technical note on contamination from PRF tubes containing silica and silicone. <i>BMC Oral Health</i> , 2021, 21, 135.	2.3	32
28	Treatment of human infrabony periodontal defects by grafting human cultured periosteum sheets combined with platelet-rich plasma and porous hydroxyapatite granules: case series. <i>Journal of the International Academy of Periodontology</i> , 2009, 11, 206-13.	0.7	30
29	Calcitonin gene-related peptide elevates calcium and polarizes membrane potential in MG-63 cells by both cAMP-independent and -dependent mechanisms. <i>American Journal of Physiology - Cell Physiology</i> , 2004, 287, C457-C467.	4.6	29
30	Immature osteoblastic MG63 cells possess two calcitonin gene-related peptide receptor subtypes that respond differently to [Cys(Acm) _{2,7}] calcitonin gene-related peptide and CGRP. <i>American Journal of Physiology - Cell Physiology</i> , 2005, 289, C811-C818.	4.6	29
31	Basic characteristics of plasma rich in growth factors (PRGF): blood cell components and biological effects. <i>Clinical and Experimental Dental Research</i> , 2016, 2, 96-103.	1.9	29
32	Acute cytotoxic effects of silica microparticles used for coating of plastic blood-collection tubes on human periosteal cells. <i>Odontology / the Society of the Nippon Dental University</i> , 2020, 108, 545-552.	1.9	29
33	The primary site of the acrocephalic feature in Apert syndrome is a dwarf cranial base with accelerated chondrocytic differentiation due to aberrant activation of the FGFR2 signaling. <i>Bone</i> , 2011, 48, 847-856.	2.9	28
34	Tissue culture of human alveolar periosteal sheets using a stem-cell culture medium (MesenPRO-RS _α , _c): In vitro expansion of CD146-positive cells and concomitant upregulation of osteogenic potential in vivo. <i>Stem Cell Research</i> , 2013, 10, 1-19.	0.7	27
35	Striking Differences in Platelet Distribution between Advanced-Platelet-Rich Fibrin and Concentrated Growth Factors: Effects of Silica-Containing Plastic Tubes. <i>Journal of Functional Biomaterials</i> , 2019, 10, 43.	4.4	27
36	Evidence for Contamination of Silica Microparticles in Advanced Platelet-Rich Fibrin Matrices Prepared Using Silica-Coated Plastic Tubes. <i>Biomedicines</i> , 2019, 7, 45.	3.2	26

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37	Immature human osteoblastic MG63 cells predominantly express a subtype 1-like CGRP receptor that inactivates extracellular signal response kinase by a cAMP-dependent mechanism. <i>European Journal of Pharmacology</i> , 2003, 470, 125-137.	3.5	25
38	An updated proposal for terminology and classification of platelet-rich fibrin. <i>Regenerative Therapy</i> , 2017, 7, 80-81.	3.0	24
39	Distribution of platelets, transforming growth factor β 1, platelet-derived growth factor β , vascular endothelial growth factor and matrix metalloproteinase α 9 in advanced platelet-rich fibrin and concentrated growth factor matrices. <i>Journal of Investigative and Clinical Dentistry</i> , 2019, 10, e12458.	1.8	24
40	Improved adhesion of human cultured periosteal sheets to a porous poly(L-lactic acid) membrane scaffold without the aid of exogenous adhesion biomolecules. <i>Journal of Biomedical Materials Research - Part A</i> , 2011, 98A, 100-113.	4.0	23
41	Biomechanical evaluation by AFM of cultured human cell-multilayered periosteal sheets. <i>Micron</i> , 2013, 48, 1-10.	2.2	23
42	An Evaluation of the Accuracy of the Subtraction Method Used for Determining Platelet Counts in Advanced Platelet-Rich Fibrin and Concentrated Growth Factor Preparations. <i>Dentistry Journal</i> , 2017, 5, 7.	2.3	23
43	Microporous membranes of PLLA/PCL blends for periosteal tissue scaffold. <i>Materials Letters</i> , 2013, 95, 103-106.	2.6	22
44	Platelet Counts in Insoluble Platelet-Rich Fibrin Clots: A Direct Method for Accurate Determination. <i>Frontiers in Bioengineering and Biotechnology</i> , 2018, 6, 4.	4.1	22
45	Osteogenic activity of human periosteal sheets cultured on salmon collagen-coated ePTFE meshes. <i>Journal of Materials Science: Materials in Medicine</i> , 2010, 21, 731-739.	3.6	21
46	Comprehensive Quality Control of the Regenerative Therapy Using Platelet Concentrates: The Current Situation and Prospects in Japan. <i>BioMed Research International</i> , 2018, 2018, 1-10.	1.9	21
47	The Platelet Concentrates Therapy: From the Biased Past to the Anticipated Future. <i>Bioengineering</i> , 2020, 7, 82.	3.5	21
48	Calcitonin Gene-Related Peptide Stimulates Potassium Efflux through Adenosine Triphosphate-Sensitive Potassium Channels and Produces Membrane Hyperpolarization in Osteoblastic UMR106 Cells. <i>Endocrinology</i> , 1998, 139, 3492-3502.	2.8	20
49	Collagen-Coated Poly(L-lactide-co- ϵ -caprolactone) Film: A Promising Scaffold for Cultured Periosteal Sheets. <i>Journal of Periodontology</i> , 2010, 81, 1653-1662.	3.4	20
50	Extracellular ATP and ATP β S Suppress the Proliferation of Human Periodontal Ligament Cells by Different Mechanisms. <i>Journal of Periodontology</i> , 2007, 78, 748-756.	3.4	18
51	An atmospheric-pressure plasma-treated titanium surface potentially supports initial cell adhesion, growth, and differentiation of cultured human prenatal-derived osteoblastic cells. <i>Journal of Biomedical Materials Research - Part B Applied Biomaterials</i> , 2014, 102, 1289-1296.	3.4	18
52	HER2-Targeted Multifunctional Silica Nanoparticles Specifically Enhance the Radiosensitivity of HER2-Overexpressing Breast Cancer Cells. <i>International Journal of Molecular Sciences</i> , 2018, 19, 908.	4.1	18
53	Quantitative Near-Infrared Imaging of Platelets in Platelet-Rich Fibrin (PRF) Matrices: Comparative Analysis of Bio-PRF, Leukocyte-Rich PRF, Advanced-PRF and Concentrated Growth Factors. <i>International Journal of Molecular Sciences</i> , 2020, 21, 4426.	4.1	18
54	Tissue-Engineered Cultured Periosteum Sheet Application to Treat Infrabony Defects: Case Series and 5-Year Results. <i>International Journal of Periodontics and Restorative Dentistry</i> , 2013, 33, 281-287.	1.0	16

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55	Platelet-rich fibrin prepared from stored whole-blood samples. <i>International Journal of Implant Dentistry</i> , 2017, 3, 6.	2.7	16
56	NaF INDUCES EARLY DIFFERENTIATION OF MURINE BONE MARROW CELLS ALONG THE GRANULOCYTIC PATHWAY BUT NOT THE MONOCYTIC OR PREOSTEOCLASTIC PATHWAY IN VITRO. <i>In Vitro Cellular and Developmental Biology - Animal</i> , 2003, 39, 243.	1.5	14
57	An on-site preparable, novel bone-grafting complex consisting of human platelet-rich fibrin and porous particles made of a recombinant collagen-like protein. <i>Journal of Biomedical Materials Research - Part B Applied Biomaterials</i> , 2019, 107, 1420-1430.	3.4	14
58	Characteristics of NaF-induced differentiation of HL-60 cells. <i>Journal of Bone and Mineral Research</i> , 1996, 11, 1676-1687.	2.8	13
59	Evaluation by Bone Scintigraphy of Osteogenic Activity of Commercial Bioceramics (Porous β -TCP and) Tj ETQq1 1,0,784314,rgBT /Over	2.4	13
60	Nondestructive Microstructural Analysis of Porous Bioceramics by Microfocus X-ray Computed Tomography (μ CT): A Proposed Protocol for Standardized Evaluation of Porosity and Interconnectivity Between Macro-pores. <i>Journal of Nondestructive Evaluation</i> , 2011, 30, 71-80.	2.4	12
61	Spectrophotometric determination of platelet counts in platelet-rich plasma. <i>International Journal of Implant Dentistry</i> , 2018, 4, 29.	2.7	12
62	A Comparative Study of the Effects of Anticoagulants on Pure Platelet-Rich Plasma Quality and Potency. <i>Biomedicines</i> , 2020, 8, 42.	3.2	12
63	Synergistic effects of the combined use of human cultured periosteal sheets and platelet-rich fibrin on bone regeneration: An animal study. <i>Clinical and Experimental Dental Research</i> , 2017, 3, 134-141.	1.9	11
64	Quality Assessment of Platelet-Rich Fibrin-Like Matrix Prepared from Whole Blood Samples after Extended Storage. <i>Biomedicines</i> , 2017, 5, 57.	3.2	11
65	Platelet adhesion on commercially pure titanium plates in vitro I: effects of plasma components and involvement of the von Willebrand factor and fibronectin. <i>International Journal of Implant Dentistry</i> , 2019, 5, 5.	2.7	11
66	Manual cryopreservation of human alveolar periosteal tissue segments: Effects of pre-culture on recovery rate. <i>Cryobiology</i> , 2011, 62, 202-209.	0.7	10
67	High-Resolution Three-Dimensional Computed Tomography Analysis of the Clinical Efficacy of Cultured Autogenous Periosteal Cells in Sinus Lift Bone Grafting. <i>Clinical Implant Dentistry and Related Research</i> , 2016, 18, 707-716.	3.7	10
68	Spectrophotometric Determination of the Aggregation Activity of Platelets in Platelet-Rich Plasma for Better Quality Control. <i>Dentistry Journal</i> , 2019, 7, 61.	2.3	10
69	Platelet-Rich Fibrin Extract: A Promising Fetal Bovine Serum Alternative in Explant Cultures of Human Periosteal Sheets for Regenerative Therapy. <i>International Journal of Molecular Sciences</i> , 2019, 20, 1053.	4.1	10
70	Concentrated Growth Factor Matrices Prepared Using Silica-Coated Plastic Tubes Are Distinguishable From Those Prepared Using Glass Tubes in Platelet Distribution: Application of a Novel Near-Infrared Imaging-Based, Quantitative Technique. <i>Frontiers in Bioengineering and Biotechnology</i> , 2020, 8, 600.	4.1	10
71	Proposal for point-of-care testing of platelet-rich plasma quality. <i>International Journal of Growth Factors and Stem Cells in Dentistry</i> , 2019, 2, 13.	0.6	10
72	Granulocyte Colony-stimulating Factor Synergistically Augments 1,25-Dihydroxyvitamin D3-Induced Monocytic Differentiation in Murine Bone Marrow Cell Cultures. <i>Hormone and Metabolic Research</i> , 2004, 36, 445-452.	1.5	9

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73	An osteogenic grafting complex combining human periosteal sheets with a porous poly(l-lactic acid) membrane scaffold: Biocompatibility, biodegradability, and cell fate in vivo. <i>Journal of Bioactive and Compatible Polymers</i> , 2012, 27, 107-121.	2.1	9
74	Application of stem-cell media to explant culture of human periosteum: An optimal approach for preparing osteogenic cell material. <i>Journal of Tissue Engineering</i> , 2013, 4, 204173141350964.	5.5	9
75	X-Ray-Induced Damage to the Submandibular Salivary Glands in Mice: An Analysis of Strain-Specific Responses. <i>BioResearch Open Access</i> , 2015, 4, 307-318.	2.6	9
76	Fluorescent Cytochemical Detection of Polyphosphates Associated with Human Platelets. <i>International Journal of Molecular Sciences</i> , 2021, 22, 1040.	4.1	9
77	Effects of Leukocyte-Platelet-Rich Fibrin (L-PRF) on Pain, Soft Tissue Healing, Growth Factors, and Cytokines after Third Molar Extraction: A Randomized, Split-Mouth, Double-Blinded Clinical Trial. <i>Applied Sciences (Switzerland)</i> , 2021, 11, 1666.	2.5	9
78	Fluorometric Quantification of Human Platelet Polyphosphate Using 4 ² ,6-Diamidine-2-phenylindole Dihydrochloride: Applications in the Japanese Population. <i>International Journal of Molecular Sciences</i> , 2021, 22, 7257.	4.1	9
79	Establishment of murine macrophage-like mutant and hybrid cell lines: Comparative analysis of the differentiation induced by 1 α ,25-dihydroxyvitamin D ₃ and recombinant murine interferon- γ . <i>Cellular Immunology</i> , 1991, 132, 350-365.	3.0	8
80	Possible regulation of epidermal growth factor-receptor tyrosine autophosphorylation by calcium and G proteins in chemically permeabilized rat UMR106 cells. <i>Archives of Oral Biology</i> , 1999, 44, 157-171.	1.8	8
81	In-vivo near-infrared optical imaging of growing osteosarcoma cell lesions xenografted in mice: dual-channel quantitative evaluation of volume and mineralization. <i>Acta Radiologica</i> , 2011, 52, 978-988.	1.1	8
82	Distribution and quantification of activated platelets in platelet-rich fibrin matrices. <i>Platelets</i> , 2020, , 1-6.	2.3	8
83	Real-time quantitative polymerase chain reaction and flow cytometric analyses of cell adhesion molecules expressed in human cell ² multilayered periosteal sheets in vitro. <i>Cytotherapy</i> , 2014, 16, 653-661.	0.7	7
84	Quantitative evaluation of morphological changes in activated platelets in vitro using digital holographic microscopy. <i>Micron</i> , 2018, 113, 1-9.	2.2	7
85	Quantitative single ² cell motility analysis of platelet ² rich plasma ² treated endothelial cells in vitro. <i>Cytoskeleton</i> , 2015, 72, 246-255.	2.0	6
86	Evaluating the Safety of Somatic Periosteal Cells by Flow-Cytometric Analysis Monitoring the History of DNA Damage. <i>Biopreservation and Biobanking</i> , 2016, 14, 129-137.	1.0	6
87	Imaging of Metastatic Cancer Cells in Sentinel Lymph Nodes using Affibody Probes and Possibility of a Theranostic Approach. <i>International Journal of Molecular Sciences</i> , 2019, 20, 427.	4.1	6
88	Platelet-rich plasma and its derived platelet concentrates: what dentists involved in cell-based regenerative therapy should know. <i>Journal of Japanese Society of Periodontology</i> , 2017, 59, 68-76.	0.1	6
89	Non-invasive, quantitative assessment of the morphology of γ -irradiated human mesenchymal stem cells and periosteal cells using digital holographic microscopy. <i>International Journal of Radiation Biology</i> , 2016, 92, 796-805.	1.8	5
90	Platelet Adhesion on Commercially Pure Titanium Plates in Vitro II. Immunofluorescence Visualization of PDGF-B, TGF β ² 1, and PPAR γ ³ Released from Activated Adherent Platelets. <i>Dentistry Journal</i> , 2019, 7, 109.	2.3	5

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91	A Short-Term Preservation of Human Cultured Periosteal Sheets, Osteogenic Grafting Materials, Using a Commercial Preservation Solution Containing Epigallocatechin-3-gallate (Theliokeep®) under Hypothermic Conditions. <i>Biopreservation and Biobanking</i> , 2012, 10, 245-252.	1.0	4
92	X-ray and ultraviolet C irradiation-induced γ -H2AX and p53 formation in normal human periosteal cells in vitro: markers for quality control in cell therapy. <i>Cytotherapy</i> , 2015, 17, 112-123.	0.7	4
93	The Cell-Multilayered Periosteal Sheet "A Promising Osteogenic and Osteoinductive Grafting Material." , 0, , .		4
94	Effects of SARS-CoV-2 mRNA vaccines on platelet polyphosphate levels and inflammation: A pilot study. <i>Biomedical Reports</i> , 2022, 16, 21.	2.0	4
95	A Strategic and Worldwide Cooperative Challenge Required for the Next Generation of Platelet Concentrates. <i>International Journal of Molecular Sciences</i> , 2022, 23, 3437.	4.1	4
96	A Hepatocyte Growth Factor (HGF)/Receptor Autocrine Loop Regulates Constitutive Self-Renewal of Human Periodontal Ligament Cells but Reduces Sensitivity to Exogenous HGF. <i>Journal of Periodontology</i> , 2006, 77, 1723-1730.	3.4	2
97	Platelet adhesion on commercially pure titanium plates in vitro III: effects of calcium phosphate-blasting on titanium plate biocompatibility. <i>International Journal of Implant Dentistry</i> , 2020, 6, 74.	2.7	2
98	Osteoclastogenic Potential of Tissue-Engineered Periosteal Sheet: Effects of Culture Media on the Ability to Recruit Osteoclast Precursors. <i>International Journal of Molecular Sciences</i> , 2021, 22, 2169.	4.1	1
99	Translational researches in the periodontal regenerative therapy :From bioactive factors to cytotherapy. <i>Journal of Japanese Society of Periodontology</i> , 2010, 52, 3-13.	0.1	1
100	Utilit� dei derivati del sangue di seconda generazione nella terapia rigenerativa delle ferite complesse delle estremit�. , 2020, 44, .	0.1	1
101	�Original Contribution� Preparation of a Poly(L-Lactic Acid) Membrane Scaffold with Open Finger-Like Pores Prepared by a Nonsolvent-Induced Phase Separation Method with the Aid of a Surfactant. <i>Membrane</i> , 2016, 41, 304-310.	0.0	0
102	Quantificazione delle piastrine e dei leucociti nei concentrati piastrinici solidi del sangue per uso chirurgico: studio di una tecnica sperimentale. <i>Chirurgia (Turin)</i> , 2021, 34, .	0.1	0
103	Development and Clinical Application of PRF Membranes to Enhance Periodontal Regenerative Therapy. <i>Membrane</i> , 2015, 40, 118-123.	0.0	0
104	Non-destructive, spectrophotometric analysis of the thickness of the cell-multilayered periosteal sheet. <i>International Journal of Implant Dentistry</i> , 2022, 8, 21.	2.7	0
105	Responses of promyelocytic leukemia HL60 cells as an inflammatory cell lineage model to silica microparticles used to coat blood collection tubes. <i>International Journal of Implant Dentistry</i> , 2022, 8, 24.	2.7	0