

Amit Gefen

List of Publications by Year in descending order

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Version: 2024-02-01

341
papers

14,104
citations

34076

52
h-index

28275

105
g-index

347
all docs

347
docs citations

347
times ranked

12247
citing authors

#	ARTICLE	IF	CITATIONS
1	Tensional homeostasis and the malignant phenotype. <i>Cancer Cell</i> , 2005, 8, 241-254.	7.7	3,397
2	Are in vivo and in situ brain tissues mechanically similar?. <i>Journal of Biomechanics</i> , 2004, 37, 1339-1352.	0.9	372
3	Assessment of mechanical conditions in sub-dermal tissues during sitting: A combined experimental-MRI and finite element approach. <i>Journal of Biomechanics</i> , 2007, 40, 1443-1454.	0.9	273
4	A new pressure ulcer conceptual framework. <i>Journal of Advanced Nursing</i> , 2014, 70, 2222-2234.	1.5	271
5	Age-Dependent Changes in Material Properties of the Brain and Braincase of the Rat. <i>Journal of Neurotrauma</i> , 2003, 20, 1163-1177.	1.7	263
6	Biomechanical Analysis of the Three-Dimensional Foot Structure During Gait: A Basic Tool for Clinical Applications. <i>Journal of Biomechanical Engineering</i> , 2000, 122, 630-639.	0.6	227
7	Plantar soft tissue loading under the medial metatarsals in the standing diabetic foot. <i>Medical Engineering and Physics</i> , 2003, 25, 491-499.	0.8	201
8	Mechanics of the normal woman's breast. <i>Technology and Health Care</i> , 2007, 15, 259-271.	0.5	191
9	Pressure-time cell death threshold for albino rat skeletal muscles as related to pressure sore biomechanics. <i>Journal of Biomechanics</i> , 2006, 39, 2725-2732.	0.9	180
10	Strains and stresses in sub-dermal tissues of the buttocks are greater in paraplegics than in healthy during sitting. <i>Journal of Biomechanics</i> , 2008, 41, 567-580.	0.9	175
11	Mechanical compression-induced pressure sores in rat hindlimb: muscle stiffness, histology, and computational models. <i>Journal of Applied Physiology</i> , 2004, 96, 2034-2049.	1.2	162
12	Analysis of muscular fatigue and foot stability during high-heeled gait. <i>Gait and Posture</i> , 2002, 15, 56-63.	0.6	160
13	Strain-time cell-death threshold for skeletal muscle in a tissue-engineered model system for deep tissue injury. <i>Journal of Biomechanics</i> , 2008, 41, 2003-2012.	0.9	153
14	In vivo biomechanical behavior of the human heel pad during the stance phase of gait. <i>Journal of Biomechanics</i> , 2001, 34, 1661-1665.	0.9	145
15	In Vivo Muscle Stiffening Under Bone Compression Promotes Deep Pressure Sores. <i>Journal of Biomechanical Engineering</i> , 2005, 127, 512-524.	0.6	140
16	Stress analysis of the standing foot following surgical plantar fascia release. <i>Journal of Biomechanics</i> , 2002, 35, 629-637.	0.9	139
17	Device-related pressure ulcers: SECURE prevention. <i>Journal of Wound Care</i> , 2020, 29, S1-S52.	0.5	132
18	Update to device-related pressure ulcers: SECURE prevention. COVID-19, face masks and skin damage. <i>Journal of Wound Care</i> , 2020, 29, 245-259.	0.5	123

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19	Microclimate: A critical review in the context of pressure ulcer prevention. <i>Clinical Biomechanics</i> , 2018, 59, 62-70.	0.5	116
20	Biomechanical analysis of the keratoconic cornea. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2009, 2, 224-236.	1.5	115
21	Internal mechanical conditions in the soft tissues of a residual limb of a trans-tibial amputee. <i>Journal of Biomechanics</i> , 2008, 41, 1897-1909.	0.9	102
22	How do microclimate factors affect the risk for superficial pressure ulcers: A mathematical modeling study. <i>Journal of Tissue Viability</i> , 2011, 20, 81-88.	0.9	102
23	The <i>in Vivo</i> Elastic Properties of the Plantar Fascia during the Contact Phase of Walking. <i>Foot and Ankle International</i> , 2003, 24, 238-244.	1.1	96
24	The Effects of Pressure and Shear on Capillary Closure in the Microstructure of Skeletal Muscles. <i>Annals of Biomedical Engineering</i> , 2007, 35, 2095-2107.	1.3	92
25	Stress Relaxation of Porcine Gluteus Muscle Subjected to Sudden Transverse Deformation as Related to Pressure Sore Modeling. <i>Journal of Biomechanical Engineering</i> , 2006, 128, 782-787.	0.6	90
26	Mechanotransduction in adipocytes. <i>Journal of Biomechanics</i> , 2012, 45, 1-8.	0.9	90
27	Integration of plantar soft tissue stiffness measurements in routine MRI of the diabetic foot. <i>Clinical Biomechanics</i> , 2001, 16, 921-925.	0.5	89
28	Is obesity a risk factor for deep tissue injury in patients with spinal cord injury?. <i>Journal of Biomechanics</i> , 2008, 41, 3322-3331.	0.9	89
29	Adipocyte Stiffness Increases with Accumulation of Lipid Droplets. <i>Biophysical Journal</i> , 2014, 106, 1421-1431.	0.2	89
30	Computational simulations of stress shielding and bone resorption around existing and computer-designed orthopaedic screws. <i>Medical and Biological Engineering and Computing</i> , 2002, 40, 311-322.	1.6	86
31	In situ forming hydrogels composed of oxidized high molecular weight hyaluronic acid and gelatin for nucleus pulposus regeneration. <i>Acta Biomaterialia</i> , 2013, 9, 5181-5193.	4.1	84
32	Biomechanical analysis of fatigue-related foot injury mechanisms in athletes and recruits during intensive marching. <i>Medical and Biological Engineering and Computing</i> , 2002, 40, 302-310.	1.6	83
33	The biomechanical efficacy of dressings in preventing heel ulcers. <i>Journal of Tissue Viability</i> , 2015, 24, 1-11.	0.9	83
34	Stress Analyses Coupled With Damage Laws to Determine Biomechanical Risk Factors for Deep Tissue Injury During Sitting. <i>Journal of Biomechanical Engineering</i> , 2009, 131, 011003.	0.6	80
35	Our contemporary understanding of the aetiology of pressure ulcers/pressure injuries. <i>International Wound Journal</i> , 2022, 19, 692-704.	1.3	80
36	Viscoelastic Properties of Ovine Adipose Tissue Covering the Gluteus Muscles. <i>Journal of Biomechanical Engineering</i> , 2007, 129, 924-930.	0.6	78

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37	Exposure to internal muscle tissue loads under the ischial tuberosities during sitting is elevated at abnormally high or low body mass indices. <i>Journal of Biomechanics</i> , 2010, 43, 280-286.	0.9	78
38	Optimizing the biomechanical compatibility of orthopedic screws for bone fracture fixation. <i>Medical Engineering and Physics</i> , 2002, 24, 337-347.	0.8	76
39	Static mechanical stretching accelerates lipid production in 3T3-L1 adipocytes by activating the MEK signaling pathway. <i>American Journal of Physiology - Cell Physiology</i> , 2012, 302, C429-C441.	2.1	76
40	The biomechanics of sitting-acquired pressure ulcers in patients with spinal cord injury or lesions. <i>International Wound Journal</i> , 2007, 4, 222-231.	1.3	73
41	The biomechanics of heel ulcers. <i>Journal of Tissue Viability</i> , 2010, 19, 124-131.	0.9	71
42	An air-cell-based cushion for pressure ulcer protection remarkably reduces tissue stresses in the seated buttocks with respect to foams: Finite element studies. <i>Journal of Tissue Viability</i> , 2014, 23, 13-23.	0.9	71
43	Weight and pressure ulcer occurrence: A secondary data analysis. <i>International Journal of Nursing Studies</i> , 2011, 48, 1339-1348.	2.5	69
44	Real-Time Finite Element Monitoring of Sub-Dermal Tissue Stresses in Individuals with Spinal Cord Injury: Toward Prevention of Pressure Ulcers. <i>Annals of Biomedical Engineering</i> , 2009, 37, 387-400.	1.3	68
45	The influence of foot posture, support stiffness, heel pad loading and tissue mechanical properties on biomechanical factors associated with a risk of heel ulceration. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2011, 4, 572-582.	1.5	67
46	Predicting penile size during erection. <i>International Journal of Impotence Research</i> , 2000, 12, 328-333.	1.0	60
47	Real-Time Patient-Specific Finite Element Analysis of Internal Stresses in the Soft Tissues of a Residual Limb: A New Tool for Prosthetic Fitting. <i>Annals of Biomedical Engineering</i> , 2006, 35, 120-135.	1.3	60
48	Confocal microscopy-based three-dimensional cell-specific modeling for large deformation analyses in cellular mechanics. <i>Journal of Biomechanics</i> , 2010, 43, 1806-1816.	0.9	59
49	Thermosensitive hydrogel made of ferulic acid-gelatin and chitosan glycerophosphate. <i>Carbohydrate Polymers</i> , 2013, 92, 1512-1519.	5.1	57
50	Analysis of stress distribution in the alveolar septa of normal and simulated emphysematic lungs. <i>Journal of Biomechanics</i> , 1999, 32, 891-897.	0.9	56
51	Risk factors for a pressure-related deep tissue injury: a theoretical model. <i>Medical and Biological Engineering and Computing</i> , 2007, 45, 563-573.	1.6	56
52	Developing a pressure ulcer risk factor minimum data set and risk assessment framework. <i>Journal of Advanced Nursing</i> , 2014, 70, 2339-2352.	1.5	55
53	Effects of humidity on skin friction against medical textiles as related to prevention of pressure injuries. <i>International Wound Journal</i> , 2018, 15, 866-874.	1.3	54
54	Comparison of the trabecular architecture and the isostatic stress flow in the human calcaneus. <i>Medical Engineering and Physics</i> , 2004, 26, 119-129.	0.8	53

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55	The free diffusion of macromolecules in tissue-engineered skeletal muscle subjected to large compression strains. <i>Journal of Biomechanics</i> , 2008, 41, 845-853.	0.9	52
56	Relationship Between Strain Levels and Permeability of the Plasma Membrane in Statically Stretched Myoblasts. <i>Annals of Biomedical Engineering</i> , 2012, 40, 606-618.	1.3	52
57	Different wound healing properties of dermis, adipose, and gingiva mesenchymal stromal cells. <i>Wound Repair and Regeneration</i> , 2016, 24, 100-109.	1.5	52
58	Cytoskeleton and plasma-membrane damage resulting from exposure to sustained deformations: A review of the mechanobiology of chronic wounds. <i>Medical Engineering and Physics</i> , 2016, 38, 828-833.	0.8	51
59	Real-time subject-specific monitoring of internal deformations and stresses in the soft tissues of the foot: A new approach in gait analysis. <i>Journal of Biomechanics</i> , 2006, 39, 2673-2689.	0.9	50
60	The false premise in measuring body-support interface pressures for preventing serious pressure ulcers. <i>Journal of Medical Engineering and Technology</i> , 2007, 31, 375-380.	0.8	49
61	Mechanics of the normal woman's breast. <i>Technology and Health Care</i> , 2007, 15, 259-71.	0.5	49
62	A standardized objective method for continuously measuring the kinematics of cultures covering a mechanically damaged site. <i>Medical Engineering and Physics</i> , 2012, 34, 225-232.	0.8	48
63	Effects of ambient conditions on the risk of pressure injuries in bedridden patients—physics modelling of microclimate. <i>International Wound Journal</i> , 2018, 15, 402-416.	1.3	48
64	Use of weight-bearing MRI for evaluating wheelchair cushions based on internal soft-tissue deformations under ischial tuberosities. <i>Journal of Rehabilitation Research and Development</i> , 2010, 47, 31.	1.6	48
65	The natural medications for wound healing “Curcumin, Aloe-Vera and Ginger” do not induce a significant effect on the migration kinematics of cultured fibroblasts. <i>Journal of Biomechanics</i> , 2013, 46, 170-174.	0.9	47
66	Computational Studies of Strain Exposures in Neonate and Mature Rat Brains during Closed Head Impact. <i>Journal of Neurotrauma</i> , 2006, 23, 1570-1580.	1.7	46
67	Device-related pressure ulcers from a biomechanical perspective. <i>Journal of Tissue Viability</i> , 2017, 26, 57-68.	0.9	46
68	Protecting prone positioned patients from facial pressure ulcers using prophylactic dressings: A timely biomechanical analysis in the context of the COVID-19 pandemic. <i>International Wound Journal</i> , 2020, 17, 1595-1606.	1.3	46
69	Methods to study differences in cell mobility during skin wound healing in vitro. <i>Journal of Biomechanics</i> , 2016, 49, 1381-1387.	0.9	45
70	Single-trabecula building block for large-scale finite element models of cancellous bone. <i>Medical and Biological Engineering and Computing</i> , 2004, 42, 549-556.	1.6	44
71	Patient-specific analyses of deep tissue loads post transtibial amputation in residual limbs of multiple prosthetic users. <i>Journal of Biomechanics</i> , 2009, 42, 2686-2693.	0.9	44
72	Large, but not Small Sustained Tensile Strains Stimulate Adipogenesis in Culture. <i>Annals of Biomedical Engineering</i> , 2012, 40, 1052-1060.	1.3	44

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73	A semi-stochastic cell-based formalism to model the dynamics of migration of cells in colonies. <i>Biomechanics and Modeling in Mechanobiology</i> , 2012, 11, 183-195.	1.4	43
74	A randomised controlled trial of the clinical effectiveness of multi-layer silicone foam dressings for the prevention of pressure injuries in high-risk aged care residents: The Border III Trial. <i>International Wound Journal</i> , 2018, 15, 482-490.	1.3	43
75	Effects of skin wrinkles, age and wetness on mechanical loads in the stratum corneum as related to skin lesions. <i>Medical and Biological Engineering and Computing</i> , 2011, 49, 97-105.	1.6	42
76	Outdoor dynamic subject-specific evaluation of internal stresses in the residual limb: Hydraulic energy-stored prosthetic foot compared to conventional energy-stored prosthetic feet. <i>Gait and Posture</i> , 2012, 35, 121-125.	0.6	42
77	Cell shape alteration during adipogenesis is associated with coordinated matrix cues. <i>Journal of Cellular Physiology</i> , 2019, 234, 3850-3863.	2.0	42
78	Membrane-Stretch-Induced Cell Death in Deep Tissue Injury: Computer Model Studies. <i>Cellular and Molecular Bioengineering</i> , 2009, 2, 118-132.	1.0	41
79	Surgical and Morphological Factors that Affect Internal Mechanical Loads in Soft Tissues of the Transtibial Residuum. <i>Annals of Biomedical Engineering</i> , 2009, 37, 2583-2605.	1.3	39
80	Deformations, mechanical strains and stresses across the different hierarchical scales in weight-bearing soft tissues. <i>Journal of Tissue Viability</i> , 2012, 21, 39-46.	0.9	39
81	An Observational, Prospective Cohort Pilot Study to Compare the Use of Subepidermal Moisture Measurements Versus Ultrasound and Visual Skin Assessments for Early Detection of Pressure Injury. <i>Ostomy - Wound Management</i> , 2018, 64, 12-27.	0.8	39
82	Microwave Drilling of Bones. <i>IEEE Transactions on Biomedical Engineering</i> , 2006, 53, 1174-1182.	2.5	38
83	Dressings cut to shape alleviate facial tissue loads while using an oxygen mask. <i>International Wound Journal</i> , 2019, 16, 813-826.	1.3	38
84	An MRI investigation of the effects of user anatomy and wheelchair cushion type on tissue deformation. <i>Journal of Tissue Viability</i> , 2018, 27, 42-53.	0.9	37
85	How medical engineering has changed our understanding of chronic wounds and future prospects. <i>Medical Engineering and Physics</i> , 2019, 72, 13-18.	0.8	37
86	Effects of Intramuscular Fat Infiltration, Scarring, and Spasticity on the Risk for Sitting-Acquired Deep Tissue Injury in Spinal Cord Injury Patients. <i>Journal of Biomechanical Engineering</i> , 2011, 133, 021011.	0.6	36
87	Reducing musculoskeletal disorders among computer operators: comparison between ergonomics interventions at the workplace. <i>Ergonomics</i> , 2012, 55, 1571-1585.	1.1	36
88	Bioengineering Models of Deep Tissue Injury. <i>Advances in Skin and Wound Care</i> , 2008, 21, 30-36.	0.5	35
89	COVID-19: pressure ulcers, pain and the cytokine storm. <i>Journal of Wound Care</i> , 2020, 29, 540-542.	0.5	35
90	Measurements of the Static Friction Coefficient Between Bone and Muscle Tissues. <i>Journal of Biomechanical Engineering</i> , 2010, 132, 084502.	0.6	34

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91	Confocal-based cell-specific finite element modeling extended to study variable cell shapes and intracellular structures: The example of the adipocyte. <i>Journal of Biomechanics</i> , 2011, 44, 567-573.	0.9	34
92	The mechanics of hyaluronic acid/adipic acid dihydrazide hydrogel: Towards developing a vessel for delivery of preadipocytes to native tissues. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2013, 28, 320-331.	1.5	34
93	Effect of laser therapy on expression of angio- and fibrogenic factors, and cytokine concentrations during the healing process of human pressure ulcers. <i>International Journal of Medical Sciences</i> , 2018, 15, 1105-1112.	1.1	34
94	Critical biomechanical and clinical insights concerning tissue protection when positioning patients in the operating room: A scoping review. <i>International Wound Journal</i> , 2020, 17, 1405-1423.	1.3	33
95	A Method for Quick, Low-Cost Automated Confluency Measurements. <i>Microscopy and Microanalysis</i> , 2011, 17, 915-922.	0.2	32
96	Simulations of skin and subcutaneous tissue loading in the buttocks while regaining weight-bearing after a push-up in wheelchair users. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2013, 28, 436-447.	1.5	32
97	Reswick and Rogers pressure-time curve for pressure ulcer risk. Part 2. <i>Nursing Standard (Royal Tj ETQq1 1 0.784314 rgBT /Overlock 10</i>	0.1	31
98	The contribution of a directional preference of stiffness to the efficacy of prophylactic sacral dressings in protecting healthy and diabetic tissues from pressure injury: computational modelling studies. <i>International Wound Journal</i> , 2017, 14, 1370-1377.	1.3	31
99	Evaluation of the effect of trunk tilt on compressive soft tissue deformations under the ischial tuberosities using weight-bearing MRI. <i>Clinical Biomechanics</i> , 2010, 25, 402-408.	0.5	30
100	Changes in permeability of the plasma membrane of myoblasts to fluorescent dyes with different molecular masses under sustained uniaxial stretching. <i>Medical Engineering and Physics</i> , 2013, 35, 601-607.	0.8	30
101	Modeling the Effects of Moisture-Related Skin-Support Friction on the Risk for Superficial Pressure Ulcers during Patient Repositioning in Bed. <i>Frontiers in Bioengineering and Biotechnology</i> , 2013, 1, 9.	2.0	30
102	Healthcare Engineering Defined: A White Paper. <i>Journal of Healthcare Engineering</i> , 2015, 6, 635-648.	1.1	29
103	Ratio of total traction force to projected cell area is preserved in differentiating adipocytes. <i>Integrative Biology (United Kingdom)</i> , 2015, 7, 1212-1217.	0.6	29
104	The biomechanical protective effects of a treatment dressing on the soft tissues surrounding a non-offloaded sacral pressure ulcer. <i>International Wound Journal</i> , 2019, 16, 684-695.	1.3	29
105	Contribution of muscular weakness to osteoporosis: Computational and animal models. <i>Clinical Biomechanics</i> , 2005, 20, 984-997.	0.5	28
106	A method for patient-specific evaluation of vertebral cancellous bone strength: In vitro validation. <i>Clinical Biomechanics</i> , 2007, 22, 282-291.	0.5	28
107	What makes a good head positioner for preventing occipital pressure ulcers. <i>International Wound Journal</i> , 2018, 15, 243-249.	1.3	28
108	How much time does it take to get a pressure ulcer? Integrated evidence from human, animal, and in vitro studies. <i>Ostomy - Wound Management</i> , 2008, 54, 26-8, 30-5.	0.8	28

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109	Modeling mechanical strains and stresses in soft tissues of the shoulder during load carriage based on load-bearing open MRI. <i>Journal of Applied Physiology</i> , 2012, 112, 597-606.	1.2	27
110	The Influence of Ischemic Factors on the Migration Rates of Cell Types Involved in Cutaneous and Subcutaneous Pressure Ulcers. <i>Annals of Biomedical Engineering</i> , 2012, 40, 1929-1939.	1.3	27
111	A phenomenological model for chemico-mechanically induced cell shape changes during migration and cell-cell contacts. <i>Biomechanics and Modeling in Mechanobiology</i> , 2013, 12, 301-323.	1.4	27
112	Mechanical cytoprotection: A review of cytoskeleton-protection approaches for cells. <i>Journal of Biomechanics</i> , 2016, 49, 1321-1329.	0.9	27
113	Simulations of foot stability during gait characteristic of ankle dorsiflexor weakness in the elderly. <i>IEEE Transactions on Neural Systems and Rehabilitation Engineering</i> , 2001, 9, 333-337.	2.7	26
114	Reswick and Rogers pressure-time curve for pressure ulcer risk. Part 1. <i>Nursing Standard (Royal Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 5</i>	0.1	26
115	Reswick and Rogers pressure-time curve for pressure ulcer risk. Part 1. <i>Nursing Standard (Royal Tj ETQq1 1 0.784314 rgBT /Overlock 10</i>	0.1	26
116	Real-time subject-specific analyses of dynamic internal tissue loads in the residual limb of transtibial amputees. <i>Medical Engineering and Physics</i> , 2010, 32, 312-323.	0.8	26
117	Quantitative Monitoring of Lipid Accumulation Over Time in Cultured Adipocytes as Function of Culture Conditions: Toward Controlled Adipose Tissue Engineering. <i>Tissue Engineering - Part C: Methods</i> , 2010, 16, 1167-1181.	1.1	26
118	Stresses in the normal and diabetic human penis following implantation of an inflatable prosthesis. <i>Medical and Biological Engineering and Computing</i> , 1999, 37, 625-631.	1.6	25
119	Automatic detection of cell divisions (mitosis) in live-imaging microscopy images using Convolutional Neural Networks. , 2015, 2015, 743-6.		25
120	Clinical and biomechanical perspectives on pressure injury prevention research: The case of prophylactic dressings. <i>Clinical Biomechanics</i> , 2016, 38, 29-34.	0.5	25
121	The subepidermal moisture scanner: the technology explained. <i>Journal of Wound Care</i> , 2020, 29, S10-S16.	0.5	25
122	The Compression Intensity Index: A practical anatomical estimate of the biomechanical risk for a deep tissue injury. <i>Technology and Health Care</i> , 2008, 16, 141-149.	0.5	24
123	The influence of mechanical stretching on mitosis, growth, and adipose conversion in adipocyte cultures. <i>Biomechanics and Modeling in Mechanobiology</i> , 2012, 11, 1029-1045.	1.4	24
124	A new technique for studying directional cell migration in a hydrogel-based three-dimensional matrix for tissue engineering model systems. <i>Micron</i> , 2013, 51, 9-12.	1.1	24
125	Validity of the modified RULA for computer workers and reliability of one observation compared to six. <i>Ergonomics</i> , 2014, 57, 1856-1863.	1.1	24
126	Extensive Characterization and Comparison of Endothelial Cells Derived from Dermis and Adipose Tissue: Potential Use in Tissue Engineering. <i>PLoS ONE</i> , 2016, 11, e0167056.	1.1	24

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127	Device-related pressure ulcers: SECURE prevention. Second edition. Journal of Wound Care, 2022, 31, S1-S72.	0.5	24
128	How to select the elastic modulus for cancellous bone in patient-specific continuum models of the spine. Medical and Biological Engineering and Computing, 2005, 43, 465-472.	1.6	23
129	Time-related PDL: viscoelastic response during initial orthodontic tooth movement of a tooth with functioning interproximal contact—A mathematical model. Journal of Biomechanics, 2008, 41, 1871-1877.	0.9	23
130	Low-level stretching accelerates cell migration into a gap. International Wound Journal, 2017, 14, 698-703.	1.3	23
131	Beware of the toilet: The risk for a deep tissue injury during toilet sitting. Journal of Tissue Viability, 2018, 27, 23-31.	0.9	23
132	The microclimate under dressings applied to intact weight-bearing skin: Infrared thermography studies. Clinical Biomechanics, 2020, 75, 104994.	0.5	23
133	How patient migration in bed affects the sacral soft tissue loading and thereby the risk for a hospital-acquired pressure injury. International Wound Journal, 2020, 17, 631-640.	1.3	23
134	Why is the heel particularly vulnerable to pressure ulcers?. British Journal of Nursing, 2017, 26, S62-S74.	0.3	22
135	Biomechanical Model for Stress Fracture-related Factors in Athletes and Soldiers. Medicine and Science in Sports and Exercise, 2018, 50, 1827-1836.	0.2	22
136	Physiological processes of inflammation and edema initiated by sustained mechanical loading in subcutaneous tissues: A scoping review. Wound Repair and Regeneration, 2020, 28, 242-265.	1.5	22
137	A Computer Modeling Study to Assess the Durability of Prophylactic Dressings Subjected to Moisture in Biomechanical Pressure Injury Prevention. Ostomy - Wound Management, 2018, 64, 18-26.	0.8	22
138	Trabecular Bone Contributes to Strength of the Proximal Femur Under Mediolateral Impact in the Avian. Journal of Biomechanical Engineering, 2005, 127, 198-203.	0.6	21
139	Inspiratory muscles experience fatigue faster than the calf muscles during treadmill marching. Respiratory Physiology and Neurobiology, 2007, 156, 61-68.	0.7	21
140	Effects of foot posture and heel padding devices on soft tissue deformations under the heel in supine position in males: MRI studies. Journal of Rehabilitation Research and Development, 2013, 50, 1149-1156.	1.6	21
141	Effects of accumulation of lipid droplets on load transfer between and within adipocytes. Biomechanics and Modeling in Mechanobiology, 2015, 14, 15-28.	1.4	21
142	Assessment of sub-epidermal moisture by direct measurement of tissue biocapacitance. Medical Engineering and Physics, 2019, 73, 92-99.	0.8	21
143	Phantom testing of the sensitivity and precision of a sub-epidermal moisture scanner. International Wound Journal, 2019, 16, 979-988.	1.3	21
144	A review of deep tissue injury development, detection, and prevention: shear savvy. Ostomy - Wound Management, 2013, 59, 26-35.	0.8	21

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145	A method of quantification of stress shielding in the proximal femur using hierarchical computational modeling. <i>Computer Methods in Biomechanics and Biomedical Engineering</i> , 2006, 9, 35-44.	0.9	20
146	Validity and reliability of upper extremity three-dimensional kinematics during a typing task. <i>Gait and Posture</i> , 2010, 32, 469-474.	0.6	20
147	Adjustability and Adaptability Are Critical Characteristics of Pediatric Support Surfaces. <i>Advances in Wound Care</i> , 2015, 4, 615-622.	2.6	20
148	Tissue loads applied by a novel medical device for closing large wounds. <i>Journal of Tissue Viability</i> , 2016, 25, 32-40.	0.9	20
149	Feasibility of freehand ultrasound to measure anatomical features associated with deep tissue injury risk. <i>Medical Engineering and Physics</i> , 2016, 38, 839-844.	0.8	20
150	Deep tissue loads in the seated buttocks on an off-loading wheelchair cushion versus air-cell-based and foam cushions: finite element studies. <i>International Wound Journal</i> , 2017, 14, 1327-1334.	1.3	20
151	The sorptivity and durability of gelling fibre dressings tested in a simulated sacral pressure ulcer system. <i>International Wound Journal</i> , 2021, 18, 194-208.	1.3	20
152	The mechanobiology theory of the development of medical device-related pressure ulcers revealed through a cell-scale computational modeling framework. <i>Biomechanics and Modeling in Mechanobiology</i> , 2021, 20, 851-860.	1.4	20
153	Effect of trabecular bone loss on cortical strain rate during impact in an in vitro model of avian femur. <i>BioMedical Engineering OnLine</i> , 2006, 5, 45.	1.3	19
154	Cell-level temperature distributions in skeletal muscle post spinal cord injury as related to deep tissue injury. <i>Medical and Biological Engineering and Computing</i> , 2010, 48, 113-122.	1.6	19
155	Sacral Soft Tissue Deformations When Using a Prophylactic Multilayer Dressing and Positioning System. <i>Journal of Wound, Ostomy and Continence Nursing</i> , 2018, 45, 432-437.	0.6	19
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