

Daniel Navajas

List of Publications by Year in Descending Order

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

226
papers

29,876
citations

57
h-index

172
g-index

244
ext. papers

34,150
ext. citations

6.8
avg, IF

6.28
L-index

| # | Paper | IF | Citations |
|-----|---|------|-----------|
| 226 | Novel Decellularization Method for Tissue Slices.. <i>Frontiers in Bioengineering and Biotechnology</i> , 2022 , 10, 832178 | 5.8 | 0 |
| 225 | Condensation of the Drosophila nerve cord is oscillatory and depends on coordinated mechanical interactions.. <i>Developmental Cell</i> , 2022 , 57, 867-882.e5 | 10.2 | 1 |
| 224 | Baseline Stiffness Modulates the Non-Linear Response to Stretch of the Extracellular Matrix in Pulmonary Fibrosis. <i>International Journal of Molecular Sciences</i> , 2021 , 22, | 6.3 | 1 |
| 223 | Mechanical modeling of lung alveoli: From macroscopic behaviour to cell mechano-sensing at microscopic level.. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2021 , 126, 105043 | 4.1 | 1 |
| 222 | Photodynamic Therapy in the Extracellular Matrix of Mouse Lungs: Preliminary Results of an Alternative Tissue Sterilization Process. <i>International Journal of Photoenergy</i> , 2021 , 2021, 1-9 | 2.1 | 0 |
| 221 | Realizing the actual magnitudes of aortic diameter and cardiac output: a multisensory learning approach. <i>American Journal of Physiology - Advances in Physiology Education</i> , 2021 , 45, 322-326 | 1.9 | |
| 220 | Bioprintable Lung Extracellular Matrix Hydrogel Scaffolds for 3D Culture of Mesenchymal Stromal Cells. <i>Polymers</i> , 2021 , 13, | 4.5 | 6 |
| 219 | Image-Based Method to Quantify Decellularization of Tissue Sections. <i>International Journal of Molecular Sciences</i> , 2021 , 22, | 6.3 | 2 |
| 218 | Development of Cell-Derived Matrices for Three-Dimensional Cancer Cell Models. <i>ACS Applied Materials & Interfaces</i> , 2021 , 13, 44108-44123 | 9.5 | 2 |
| 217 | Biophysically Preconditioning Mesenchymal Stem Cells Improves Treatment of Ventilator-Induced Lung Injury. <i>Archivos De Bronconeumologia</i> , 2020 , 56, 179-181 | 0.7 | 1 |
| 216 | Lung cancer aggressiveness in an intermittent hypoxia murine model of postmenopausal sleep apnea. <i>Menopause</i> , 2020 , 27, 706-713 | 2.5 | 9 |
| 215 | Silk-Reinforced Collagen Hydrogels with Raised Multiscale Stiffness for Mesenchymal Cells 3D Culture. <i>Tissue Engineering - Part A</i> , 2020 , 26, 358-370 | 3.9 | 17 |
| 214 | Low-cost, easy-to-build noninvasive pressure support ventilator for under-resourced regions: open source hardware description, performance and feasibility testing. <i>European Respiratory Journal</i> , 2020 , 55, | 13.6 | 29 |
| 213 | Biophysically Preconditioning Mesenchymal Stem Cells Improves Treatment of Ventilator-Induced Lung Injury. <i>Archivos De Bronconeumologia</i> , 2020 , 56, 179-181 | 0.7 | 5 |
| 212 | Characterization of the elastic properties of extracellular matrix models by atomic force microscopy. <i>Methods in Cell Biology</i> , 2020 , 156, 59-83 | 1.8 | 3 |
| 211 | First-in-human PeriCord cardiac bioimplant: Scalability and GMP manufacturing of an allogeneic engineered tissue graft. <i>EBioMedicine</i> , 2020 , 54, 102729 | 8.8 | 14 |
| 210 | Biomechanical Response of Lung Epithelial Cells to Iron Oxide and Titanium Dioxide Nanoparticles. <i>Frontiers in Physiology</i> , 2019 , 10, 1047 | 4.6 | 4 |

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|-----|---|------|-----|
| 209 | Effects of Sustained and Intermittent Hypoxia on Human Lung Cancer Cells. <i>American Journal of Respiratory Cell and Molecular Biology</i> , 2019 , 61, 540-544 | 5.7 | 23 |
| 208 | Proteomics Analysis of Extracellular Matrix Remodeling During Zebrafish Heart Regeneration. <i>Molecular and Cellular Proteomics</i> , 2019 , 18, 1745-1755 | 7.6 | 29 |
| 207 | Nonlinear elasticity of the lung extracellular microenvironment is regulated by macroscale tissue strain. <i>Acta Biomaterialia</i> , 2019 , 92, 265-276 | 10.8 | 18 |
| 206 | Leaves of isoprene-emitting tobacco plants maintain PSII stability at high temperatures. <i>New Phytologist</i> , 2019 , 223, 1307-1318 | 9.8 | 19 |
| 205 | Easy-to-build and affordable continuous positive airway pressure CPAP device for adult patients in low-income countries. <i>European Respiratory Journal</i> , 2019 , 53, | 13.6 | 6 |
| 204 | Telematic Multi-physician Decision-making for Improving CPAP Prescription in Sleep Apnoea. <i>Archivos De Bronconeumologia</i> , 2019 , 55, 604-606 | 0.7 | 2 |
| 203 | Differential Oxygenation in Tumor Microenvironment Modulates Macrophage and Cancer Cell Crosstalk: Novel Experimental Setting and Proof of Concept. <i>Frontiers in Oncology</i> , 2019 , 9, 43 | 5.3 | 30 |
| 202 | An in-vitro study to evaluate high-volume low-pressure endotracheal tube cuff deflation dynamics. <i>Minerva Anestesiologica</i> , 2019 , 85, 846-853 | 1.9 | 2 |
| 201 | Escherichia coli lipopolysaccharide induces alveolar epithelial cell stiffening. <i>Journal of Biomechanics</i> , 2019 , 83, 315-318 | 2.9 | 4 |
| 200 | Novel Approach for Providing Pediatric Continuous Positive Airway Pressure Devices in Low-Income, Underresourced Regions. <i>American Journal of Respiratory and Critical Care Medicine</i> , 2019 , 199, 118-120 | 10.2 | 8 |
| 199 | A comprehensive evaluation of popular proteomics software workflows for label-free proteome quantification and imputation. <i>Briefings in Bioinformatics</i> , 2018 , 19, 1344-1355 | 13.4 | 60 |
| 198 | Bioengineered Lungs: A Challenge and An Opportunity. <i>Archivos De Bronconeumologia</i> , 2018 , 54, 31-38 | 0.7 | 1 |
| 197 | Bioengineered Lungs: A Challenge and An Opportunity. <i>Archivos De Bronconeumologia</i> , 2018 , 54, 31-38 | 0.7 | 8 |
| 196 | The local microenvironment limits the regenerative potential of the mouse neonatal heart. <i>Science Advances</i> , 2018 , 4, eaao5553 | 14.3 | 84 |
| 195 | Head-to-head comparison of two engineered cardiac grafts for myocardial repair: From scaffold characterization to pre-clinical testing. <i>Scientific Reports</i> , 2018 , 8, 6708 | 4.9 | 32 |
| 194 | Bidirectional mechanobiology between cells and their local extracellular matrix probed by atomic force microscopy. <i>Seminars in Cell and Developmental Biology</i> , 2018 , 73, 71-81 | 7.5 | 36 |
| 193 | Is Telemedicine a Key Tool for Improving Continuous Positive Airway Pressure Adherence in Patients with Sleep Apnea?. <i>American Journal of Respiratory and Critical Care Medicine</i> , 2018 , 197, 12-14 | 10.2 | 15 |
| 192 | Alzheimer's Disease Mutant Mice Exhibit Reduced Brain Tissue Stiffness Compared to Wild-type Mice in both Normoxia and following Intermittent Hypoxia Mimicking Sleep Apnea. <i>Frontiers in Neurology</i> , 2018 , 9, 1 | 4.1 | 124 |

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|-----|---|------|-----|
| 191 | Aging Reduces Intermittent Hypoxia-induced Lung Carcinoma Growth in a Mouse Model of Sleep Apnea. <i>American Journal of Respiratory and Critical Care Medicine</i> , 2018 , 198, 1234-1236 | 10.2 | 17 |
| 190 | A Portable Continuous Positive Airway Pressure Device That Can Perform Optimally under Strenuous Conditions. <i>American Journal of Respiratory and Critical Care Medicine</i> , 2018 , 198, 956-958 | 10.2 | |
| 189 | Passive Stiffness of Left Ventricular Myocardial Tissue Is Reduced by Ovariectomy in a Post-menopause Mouse Model. <i>Frontiers in Physiology</i> , 2018 , 9, 1545 | 4.6 | 7 |
| 188 | Gas Partial Pressure in Cultured Cells: Patho-Physiological Importance and Methodological Approaches. <i>Frontiers in Physiology</i> , 2018 , 9, 1803 | 4.6 | 15 |
| 187 | Intermittent Hypoxia Severity in Animal Models of Sleep Apnea. <i>Frontiers in Physiology</i> , 2018 , 9, 1556 | 4.6 | 27 |
| 186 | Intermittent Hypoxia Mimicking Sleep Apnea Increases Passive Stiffness of Myocardial Extracellular Matrix. A Multiscale Study. <i>Frontiers in Physiology</i> , 2018 , 9, 1143 | 4.6 | 22 |
| 185 | A New mHealth application to support treatment of sleep apnoea patients. <i>Journal of Telemedicine and Telecare</i> , 2017 , 23, 14-18 | 6.8 | 28 |
| 184 | Ageing and chronic intermittent hypoxia mimicking sleep apnea do not modify local brain tissue stiffness in healthy mice. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2017 , 71, 106-113 | 4.1 | 9 |
| 183 | Role of Cyclooxygenase-2 on Intermittent Hypoxia-Induced Lung Tumor Malignancy in a Mouse Model of Sleep Apnea. <i>Scientific Reports</i> , 2017 , 7, 44693 | 4.9 | 30 |
| 182 | Polarized cortical tension drives zebrafish epiboly movements. <i>EMBO Journal</i> , 2017 , 36, 25-41 | 13 | 17 |
| 181 | Force Triggers YAP Nuclear Entry by Regulating Transport across Nuclear Pores. <i>Cell</i> , 2017 , 171, 1397-1414 | 14.2 | 55 |
| 180 | Force loading explains spatial sensing of ligands by cells. <i>Nature</i> , 2017 , 552, 219-224 | 50.4 | 163 |
| 179 | Standardized Nanomechanical Atomic Force Microscopy Procedure (SNAP) for Measuring Soft and Biological Samples. <i>Scientific Reports</i> , 2017 , 7, 5117 | 4.9 | 123 |
| 178 | Frequency and magnitude of intermittent hypoxia modulate endothelial wound healing in a cell culture model of sleep apnea. <i>Journal of Applied Physiology</i> , 2017 , 123, 1047-1054 | 3.7 | 10 |
| 177 | Elastic properties of hydrogels and decellularized tissue sections used in mechanobiology studies probed by atomic force microscopy. <i>Microscopy Research and Technique</i> , 2017 , 80, 85-96 | 2.8 | 23 |
| 176 | Probing Micromechanical Properties of the Extracellular Matrix of Soft Tissues by Atomic Force Microscopy. <i>Journal of Cellular Physiology</i> , 2017 , 232, 19-26 | 7 | 63 |
| 175 | Effects of two different decellularization routes on the mechanical properties of decellularized lungs. <i>PLoS ONE</i> , 2017 , 12, e0178696 | 3.7 | 11 |
| 174 | Behavior of vascular resistance undergoing various pressure insufflation and perfusion on decellularized lungs. <i>Journal of Biomechanics</i> , 2016 , 49, 1230-1232 | 2.9 | 10 |

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|-----|---|------|-----|
| 173 | Early Impairment of Lung Mechanics in a Murine Model of Marfan Syndrome. <i>PLoS ONE</i> , 2016 , 11, e01521374 | 3.7 | 18 |
| 172 | Novel Approach to Simulate Sleep Apnea Patients for Evaluating Positive Pressure Therapy Devices. <i>PLoS ONE</i> , 2016 , 11, e0151530 | 3.7 | 7 |
| 171 | A Novel Chip for Cyclic Stretch and Intermittent Hypoxia Cell Exposures Mimicking Obstructive Sleep Apnea. <i>Frontiers in Physiology</i> , 2016 , 7, 319 | 4.6 | 32 |
| 170 | Lung bioengineering: physical stimuli and stem/progenitor cell biology interplay towards biofabricating a functional organ. <i>Respiratory Research</i> , 2016 , 17, 161 | 7.3 | 12 |
| 169 | Finite element simulation for the mechanical characterization of soft biological materials by atomic force microscopy. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2016 , 62, 222-235 | 4.1 | 24 |
| 168 | Technology for noninvasive mechanical ventilation: looking into the black box. <i>ERJ Open Research</i> , 2016 , 2, | 3.5 | 11 |
| 167 | Collective cell durotaxis emerges from long-range intercellular force transmission. <i>Science</i> , 2016 , 353, 1157-61 | 33.3 | 320 |
| 166 | Physical principles of membrane remodelling during cell mechanoadaptation. <i>Nature Communications</i> , 2015 , 6, 7292 | 17.4 | 66 |
| 165 | Snail1-expressing fibroblasts in the tumor microenvironment display mechanical properties that support metastasis. <i>Cancer Research</i> , 2015 , 75, 284-95 | 10.1 | 69 |
| 164 | Parabiotic model for differentiating local and systemic effects of continuous and intermittent hypoxia. <i>Journal of Applied Physiology</i> , 2015 , 118, 42-7 | 3.7 | 3 |
| 163 | Fibroblast viability and phenotypic changes within glycated stiffened three-dimensional collagen matrices. <i>Respiratory Research</i> , 2015 , 16, 82 | 7.3 | 21 |
| 162 | Comparative assessment of several automatic CPAP devices Responses: a bench test study. <i>ERJ Open Research</i> , 2015 , 1, | 3.5 | 11 |
| 161 | Pressure- and flow-controlled media perfusion differently modify vascular mechanics in lung decellularization. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2015 , 49, 69-79 | 4.1 | 24 |
| 160 | Increased upper airway collapsibility in a mouse model of Marfan syndrome. <i>Respiratory Physiology and Neurobiology</i> , 2015 , 207, 58-60 | 2.8 | 4 |
| 159 | Hydraulic fracture during epithelial stretching. <i>Nature Materials</i> , 2015 , 14, 343-51 | 27 | 87 |
| 158 | Vascular smooth muscle cell phenotypic changes in patients with Marfan syndrome. <i>Arteriosclerosis, Thrombosis, and Vascular Biology</i> , 2015 , 35, 960-72 | 9.4 | 86 |
| 157 | Intermittent hypoxia alters gut microbiota diversity in a mouse model of sleep apnoea. <i>European Respiratory Journal</i> , 2015 , 45, 1055-65 | 13.6 | 129 |
| 156 | In vitro comparative study of two decellularization protocols in search of an optimal myocardial scaffold for recellularization. <i>American Journal of Translational Research (discontinued)</i> , 2015 , 7, 558-73 | 3 | 33 |

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|-----|---|------|-----|
| 155 | Mechanical properties of mouse lungs along organ decellularization by sodium dodecyl sulfate. <i>Respiratory Physiology and Neurobiology</i> , 2014 , 200, 1-5 | 2.8 | 29 |
| 154 | Effects of the decellularization method on the local stiffness of acellular lungs. <i>Tissue Engineering - Part C: Methods</i> , 2014 , 20, 412-22 | 2.9 | 44 |
| 153 | Mechanical properties of acellular mouse lungs after sterilization by gamma irradiation. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2014 , 40, 168-177 | 4.1 | 29 |
| 152 | Heterogeneous micromechanical properties of the extracellular matrix in healthy and infarcted hearts. <i>Acta Biomaterialia</i> , 2014 , 10, 3235-42 | 10.8 | 38 |
| 151 | Inhomogeneity of local stiffness in the extracellular matrix scaffold of fibrotic mouse lungs. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2014 , 37, 186-95 | 4.1 | 43 |
| 150 | Effects of freezing/thawing on the mechanical properties of decellularized lungs. <i>Journal of Biomedical Materials Research - Part A</i> , 2014 , 102, 413-9 | 5.4 | 67 |
| 149 | Brain tissue hypoxia and oxidative stress induced by obstructive apneas is different in young and aged rats. <i>Sleep</i> , 2014 , 37, 1249-56 | 1.1 | 23 |
| 148 | Low oxygen tension enhances the generation of lung progenitor cells from mouse embryonic and induced pluripotent stem cells. <i>Physiological Reports</i> , 2014 , 2, e12075 | 2.6 | 21 |
| 147 | Male fertility is reduced by chronic intermittent hypoxia mimicking sleep apnea in mice. <i>Sleep</i> , 2014 , 37, 1757-65 | 1.1 | 41 |
| 146 | Telemedicine-based approach for obstructive sleep apnea management: building evidence. <i>Interactive Journal of Medical Research</i> , 2014 , 3, e6 | 2.1 | 29 |
| 145 | Forced Oscillation Technique 2014 , 137-148 | | 1 |
| 144 | Use of FOT for Optimising Mechanical Ventilation 2014 , 381-395 | | |
| 143 | Chronic intermittent hypoxia preserves bone density in a mouse model of sleep apnea. <i>Respiratory Physiology and Neurobiology</i> , 2013 , 189, 646-8 | 2.8 | 14 |
| 142 | Local micromechanical properties of decellularized lung scaffolds measured with atomic force microscopy. <i>Acta Biomaterialia</i> , 2013 , 9, 6852-9 | 10.8 | 56 |
| 141 | Intermittent hypoxia increases melanoma metastasis to the lung in a mouse model of sleep apnea. <i>Respiratory Physiology and Neurobiology</i> , 2013 , 186, 303-7 | 2.8 | 106 |
| 140 | Development of a three-dimensional bone-like construct in a soft self-assembling peptide matrix. <i>Tissue Engineering - Part A</i> , 2013 , 19, 870-81 | 3.9 | 25 |
| 139 | Antioxidant effect of human adult adipose-derived stromal stem cells in alveolar epithelial cells undergoing stretch. <i>Respiratory Physiology and Neurobiology</i> , 2013 , 188, 1-8 | 2.8 | 10 |
| 138 | Barrier-protective effects of activated protein C in human alveolar epithelial cells. <i>PLoS ONE</i> , 2013 , 8, e56965 | 3.7 | 18 |

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|-----|--|------|-----|
| 137 | Cost-effectiveness of a new internet-based monitoring tool for neonatal post-discharge home care. <i>Journal of Medical Internet Research</i> , 2013 , 15, e38 | 7.6 | 12 |
| 136 | A bioreactor for subjecting cultured cells to fast-rate intermittent hypoxia. <i>Respiratory Physiology and Neurobiology</i> , 2012 , 182, 47-52 | 2.8 | 12 |
| 135 | Rapid detection of sepsis in rats through volatile organic compounds in breath. <i>Journal of Chromatography B: Analytical Technologies in the Biomedical and Life Sciences</i> , 2012 , 881-882, 76-82 | 3.2 | 26 |
| 134 | Obesity and intermittent hypoxia increase tumor growth in a mouse model of sleep apnea. <i>Sleep Medicine</i> , 2012 , 13, 1254-60 | 4.6 | 92 |
| 133 | Integrin-specific mechanoresponses to compression and extension probed by cylindrical flat-ended AFM tips in lung cells. <i>PLoS ONE</i> , 2012 , 7, e32261 | 3.7 | 28 |
| 132 | Intermittent hypoxia enhances cancer progression in a mouse model of sleep apnoea. <i>European Respiratory Journal</i> , 2012 , 39, 215-7 | 13.6 | 148 |
| 131 | Pre-treatment with mesenchymal stem cells reduces ventilator-induced lung injury. <i>European Respiratory Journal</i> , 2012 , 40, 939-48 | 13.6 | 40 |
| 130 | Mechanobiology in lung epithelial cells: measurements, perturbations, and responses. <i>Comprehensive Physiology</i> , 2012 , 2, 1-29 | 7.7 | 64 |
| 129 | Actual performance of mechanical ventilators in ICU: a multicentric quality control study. <i>Medical Devices: Evidence and Research</i> , 2012 , 5, 111-9 | 1.5 | 5 |
| 128 | Potential role of adult stem cells in obstructive sleep apnea. <i>Frontiers in Neurology</i> , 2012 , 3, 112 | 4.1 | 16 |
| 127 | Telemetric CPAP titration at home in patients with sleep apnea-hypopnea syndrome. <i>Sleep Medicine</i> , 2011 , 12, 153-7 | 4.6 | 27 |
| 126 | Early and mid-term effects of obstructive apneas in myocardial injury and inflammation. <i>Sleep Medicine</i> , 2011 , 12, 1037-40 | 4.6 | 19 |
| 125 | Tissue oxygenation in brain, muscle, and fat in a rat model of sleep apnea: differential effect of obstructive apneas and intermittent hypoxia. <i>Sleep</i> , 2011 , 34, 1127-33 | 1.1 | 80 |
| 124 | Non-invasive system for applying airway obstructions to model obstructive sleep apnea in mice. <i>Respiratory Physiology and Neurobiology</i> , 2011 , 175, 164-8 | 2.8 | 12 |
| 123 | Alternating ventilation in a rat model of increased abdominal pressure. <i>Respiratory Physiology and Neurobiology</i> , 2011 , 175, 310-5 | 2.8 | 1 |
| 122 | Sleep breathing flow characteristics as a sign for the detection of wakefulness in patients with sleep apnea. <i>Respiration</i> , 2010 , 80, 495-9 | 3.7 | 5 |
| 121 | Electroencephalographic slowing heralds mild cognitive impairment in idiopathic REM sleep behavior disorder. <i>Sleep Medicine</i> , 2010 , 11, 534-9 | 4.6 | 81 |
| 120 | Mesenchymal stem cells reduce inflammation in a rat model of obstructive sleep apnea. <i>Respiratory Physiology and Neurobiology</i> , 2010 , 172, 210-2 | 2.8 | 16 |

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|-----|--|------|-----|
| 119 | Changes in oxygen partial pressure of brain tissue in an animal model of obstructive apnea. <i>Respiratory Research</i> , 2010 , 11, 3 | 7.3 | 30 |
| 118 | Obstructive apneas induce early activation of mesenchymal stem cells and enhancement of endothelial wound healing. <i>Respiratory Research</i> , 2010 , 11, 91 | 7.3 | 20 |
| 117 | Thermal activation and ATP dependence of the cytoskeleton remodeling dynamics. <i>Physical Review E</i> , 2009 , 79, 051920 | 2.4 | 15 |
| 116 | Respiratory impedance during weaning from mechanical ventilation in a mixed population of critically ill patients. <i>British Journal of Anaesthesia</i> , 2009 , 103, 828-32 | 5.4 | 7 |
| 115 | Quality control: a necessary, but sometimes overlooked, tool for improving respiratory medicine. <i>European Respiratory Journal</i> , 2009 , 33, 722-3 | 13.6 | 5 |
| 114 | Stiffening and Contraction Induced by Dexamethasone in Alveolar Epithelial Cells. <i>Experimental Mechanics</i> , 2009 , 49, 47-55 | 2.6 | 7 |
| 113 | Biological consequences of oxygen desaturation and respiratory effort in an acute animal model of obstructive sleep apnea (OSA). <i>Sleep Medicine</i> , 2009 , 10, 892-7 | 4.6 | 34 |
| 112 | The temperature dependence of cell mechanics measured by atomic force microscopy. <i>Physical Biology</i> , 2009 , 6, 025009 | 3 | 58 |
| 111 | A Novel Simple Internet-Based System for Real Time Monitoring and Optimizing Home Mechanical Ventilation 2009 , | | 7 |
| 110 | Obstructive apneas induce early release of mesenchymal stem cells into circulating blood. <i>Sleep</i> , 2009 , 32, 117-9 | 1.1 | 31 |
| 109 | Assessment of upper airway mechanics during sleep. <i>Respiratory Physiology and Neurobiology</i> , 2008 , 163, 74-81 | 2.8 | 13 |
| 108 | Micropatterning of single endothelial cell shape reveals a tight coupling between nuclear volume in G1 and proliferation. <i>Biophysical Journal</i> , 2008 , 94, 4984-95 | 2.9 | 155 |
| 107 | Mapping cell-matrix stresses during stretch reveals inelastic reorganization of the cytoskeleton. <i>Biophysical Journal</i> , 2008 , 95, 464-71 | 2.9 | 61 |
| 106 | One-lung overventilation does not induce inflammation in the normally ventilated contralateral lung. <i>Respiratory Physiology and Neurobiology</i> , 2008 , 162, 100-2 | 2.8 | 7 |
| 105 | Definition of COPD: based on evidence or opinion?. <i>European Respiratory Journal</i> , 2008 , 31, 681-2 | 13.6 | 36 |
| 104 | Upper airway collapse and reopening induce inflammation in a sleep apnoea model. <i>European Respiratory Journal</i> , 2008 , 32, 399-404 | 13.6 | 38 |
| 103 | Morbidity due to obstructive sleep apnea: insights from animal models. <i>Current Opinion in Pulmonary Medicine</i> , 2008 , 14, 530-6 | 3 | 27 |
| 102 | Continuous positive airway pressure (CPAP) induces early nasal inflammation. <i>Sleep</i> , 2008 , 31, 127-31 | 1.1 | 24 |

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|-----|---|------|-------|
| 101 | Upper-airway inflammation triggered by vibration in a rat model of snoring. <i>Sleep</i> , 2007 , 30, 225-7 | 1.1 | 57 |
| 100 | Cell dynamic adhesion and elastic properties probed with cylindrical atomic force microscopy cantilever tips. <i>Journal of Molecular Recognition</i> , 2007 , 20, 459-66 | 2.6 | 35 |
| 99 | Past, present and future of atomic force microscopy in life sciences and medicine. <i>Journal of Molecular Recognition</i> , 2007 , 20, 418-31 | 2.6 | 134 |
| 98 | Universal physical responses to stretch in the living cell. <i>Nature</i> , 2007 , 447, 592-5 | 50.4 | 537 |
| 97 | Rat model of chronic recurrent airway obstructions to study the sleep apnea syndrome. <i>Sleep</i> , 2007 , 30, 930-3 | 1.1 | 56 |
| 96 | Automatic control of tracheal tube cuff pressure in ventilated patients in semirecumbent position: a randomized trial. <i>Critical Care Medicine</i> , 2007 , 35, 1543-9 | 1.4 | 167 |
| 95 | Effect of stretch on structural integrity and micromechanics of human alveolar epithelial cell monolayers exposed to thrombin. <i>American Journal of Physiology - Lung Cellular and Molecular Physiology</i> , 2006 , 290, L1104-10 | 5.8 | 24 |
| 94 | Noninvasive detection of expiratory flow limitation in COPD patients during nasal CPAP. <i>European Respiratory Journal</i> , 2006 , 27, 983-91 | 13.6 | 61 |
| 93 | Performance of mechanical ventilators at the patient's home: a multicentre quality control study. <i>Thorax</i> , 2006 , 61, 400-4 | 7.3 | 26 |
| 92 | Rheology of passive and adhesion-activated neutrophils probed by atomic force microscopy. <i>Biophysical Journal</i> , 2006 , 91, 3508-18 | 2.9 | 72 |
| 91 | Thrombin-induced contraction in alveolar epithelial cells probed by traction microscopy. <i>Journal of Applied Physiology</i> , 2006 , 101, 512-20 | 3.7 | 35 |
| 90 | Bench model to simulate upper airway obstruction for analyzing automatic continuous positive airway pressure devices. <i>Chest</i> , 2006 , 130, 350-61 | 5.3 | 48 |
| 89 | Standardisation of spirometry. <i>European Respiratory Journal</i> , 2005 , 26, 319-38 | 13.6 | 10528 |
| 88 | Interpretative strategies for lung function tests. <i>European Respiratory Journal</i> , 2005 , 26, 948-68 | 13.6 | 3735 |
| 87 | Probing mechanical properties of living cells by atomic force microscopy with blunted pyramidal cantilever tips. <i>Physical Review E</i> , 2005 , 72, 021914 | 2.4 | 250 |
| 86 | Stability of microfabricated high aspect ratio structures in poly(dimethylsiloxane). <i>Langmuir</i> , 2005 , 21, 5542-8 | 4 | 122 |
| 85 | Thrombin and histamine induce stiffening of alveolar epithelial cells. <i>Journal of Applied Physiology</i> , 2005 , 98, 1567-74 | 3.7 | 54 |
| 84 | Nanomechanics of lung epithelial cells. <i>International Journal of Nanotechnology</i> , 2005 , 2, 180 | 1.5 | 6 |

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|----|---|------|------|
| 83 | Animal model of unilateral ventilator-induced lung injury. <i>Intensive Care Medicine</i> , 2005 , 31, 487-90 | 14.5 | 16 |
| 82 | Vibration enhances interleukin-8 release in a cell model of snoring-induced airway inflammation. <i>Sleep</i> , 2005 , 28, 1312-6 | 1.1 | 73 |
| 81 | Effect of using the flow or the volume signals on the measurement of nonapneic respiratory events. <i>Sleep</i> , 2005 , 28, 990-2 | 1.1 | 2 |
| 80 | Standardisation of the measurement of lung volumes. <i>European Respiratory Journal</i> , 2005 , 26, 511-22 | 13.6 | 1849 |
| 79 | Standardisation of the single-breath determination of carbon monoxide uptake in the lung. <i>European Respiratory Journal</i> , 2005 , 26, 720-35 | 13.6 | 1609 |
| 78 | General considerations for lung function testing. <i>European Respiratory Journal</i> , 2005 , 26, 153-61 | 13.6 | 1351 |
| 77 | Viscoelasticity of human alveolar epithelial cells subjected to stretch. <i>American Journal of Physiology - Lung Cellular and Molecular Physiology</i> , 2004 , 287, L1025-34 | 5.8 | 110 |
| 76 | Noninvasive monitoring of respiratory mechanics during sleep. <i>European Respiratory Journal</i> , 2004 , 24, 1052-60 | 13.6 | 75 |
| 75 | Cytoskeletal mechanics in adherent human airway smooth muscle cells: probe specificity and scaling of protein-protein dynamics. <i>American Journal of Physiology - Cell Physiology</i> , 2004 , 287, C643-54 | 5.4 | 77 |
| 74 | Oxygen in the alveolar air space mediates lung inflammation in acute pancreatitis. <i>Free Radical Biology and Medicine</i> , 2004 , 37, 1640-7 | 7.8 | 9 |
| 73 | Oscillometric assessment of airway obstruction in a mechanical model of vocal cord dysfunction. <i>Journal of Biomechanics</i> , 2004 , 37, 37-43 | 2.9 | 16 |
| 72 | Static and dynamic upper airway obstruction in sleep apnea: role of the breathing gas properties. <i>American Journal of Respiratory and Critical Care Medicine</i> , 2003 , 168, 659-63 | 10.2 | 22 |
| 71 | Quality control of mechanical ventilation at the patient's home. <i>Intensive Care Medicine</i> , 2003 , 29, 484-6 | 14.5 | 16 |
| 70 | Microrheology of human lung epithelial cells measured by atomic force microscopy. <i>Biophysical Journal</i> , 2003 , 84, 2071-9 | 2.9 | 540 |
| 69 | Collapsible upper airway segment to study the obstructive sleep apnea/hypopnea syndrome in rats. <i>Respiratory Physiology and Neurobiology</i> , 2003 , 136, 199-209 | 2.8 | 37 |
| 68 | Time scale and other invariants of integrative mechanical behavior in living cells. <i>Physical Review E</i> , 2003 , 68, 041914 | 2.4 | 271 |
| 67 | Unsupervised self-testing of airway obstruction by forced oscillation at the patient's home. <i>European Respiratory Journal</i> , 2003 , 22, 668-71 | 13.6 | 12 |
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