Gary C Sieck

List of Publications by Citations

409 papers	9,928 citations	53 h-index	77 g-index
503 ext. papers	10,869 ext. citations	4.3 avg, IF	6.41 L-index

#	Paper	IF	Citations
409	Altered diaphragm contractile properties with controlled mechanical ventilation. *Journal of Applied Physiology*, **2002**, 92, 2585-95	3.7	211
408	Pressure-time product during continuous positive airway pressure, pressure support ventilation, and T-piece during weaning from mechanical ventilation. *The American Review of Respiratory Disease*, **1991**, 143, 469-75		189
407	Effects of voluntary activity and genetic selection on aerobic capacity in house mice (Mus domesticus). *Journal of Applied Physiology*, **1998**, 84, 69-76	3.7	170
406	Diaphragm dysfunction in chronic obstructive pulmonary disease. *American Journal of Respiratory and Critical Care Medicine*, **2005**, 172, 200-5	10.2	168
405	Mechanism of endothelial dysfunction in apolipoprotein E-deficient mice. *Arteriosclerosis, Thrombosis, and Vascular Biology*, **2001**, 21, 1017-22	9.4	143
404	Pkd2 haploinsufficiency alters intracellular calcium regulation in vascular smooth muscle cells. *Human Molecular Genetics*, **2003**, 12, 1875-80	5.6	139
403	Maximum specific force depends on myosin heavy chain content in rat diaphragm muscle fibers. *Journal of Applied Physiology*, **2000**, 89, 695-703	3.7	139
402	Quantitative histochemical determination of succinic dehydrogenase activity in skeletal muscle fibres. *The Histochemical Journal*, **1988**, 20, 230-43		119
401	Role of transient receptor potential C3 in TNF-alpha-enhanced calcium influx in human airway myocytes. *American Journal of Respiratory Cell and Molecular Biology*, **2006**, 35, 243-51	5.7	116
400	Cigarette smoke-induced mitochondrial fragmentation and dysfunction in human airway smooth muscle. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2014**, 306, L840-54	5.8	115
399	Role of cyclic ADP-ribose in the regulation of [Ca2+]i in porcine tracheal smooth muscle. *American Journal of Physiology - Cell Physiology*, **1998**, 274, C1653-60	5.4	114
398	Caveolae targeting and regulation of large conductance Ca(2+)-activated K+ channels in vascular endothelial cells. *Journal of Biological Chemistry*, **2005**, 280, 11656-64	5.4	111
397	Cervical dorsal rhizotomy enhances serotonergic innervation of phrenic motoneurons and serotonin-dependent long-term facilitation of respiratory motor output in rats. *Journal of Neuroscience*, **1998**, 18, 8436-43	6.6	111
396	1,25-Dihydroxyvitamin D3 Regulates Mitochondrial Oxygen Consumption and Dynamics in Human Skeletal Muscle Cells. *Journal of Biological Chemistry*, **2016**, 291, 1514-28	5.4	105
395	Skeletal muscle force and actomyosin ATPase activity reduced by nitric oxide donor. *Journal of Applied Physiology*, **1997**, 83, 1326-32	3.7	105
394	Human diaphragm remodeling associated with chronic obstructive pulmonary disease: clinical implications. *American Journal of Respiratory and Critical Care Medicine*, **2003**, 168, 706-13	10.2	105
393	Mitochondrial Dysfunction in Airway Disease. *Chest*, **2017**, 152, 618-626	5.3	104

392	Diaphragm motor unit recruitment in rats. *Respiratory Physiology and Neurobiology*, **2010**, 173, 101-6	2.8	104
391	Retrograde labeling of phrenic motoneurons by intrapleural injection. *Journal of Neuroscience Methods*, **2009**, 182, 244-9	3	98
390	Store-operated Ca2+ entry in porcine airway smooth muscle. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2004**, 286, L909-17	5.8	91
389	Diaphragm muscle sarcopenia in aging mice. *Experimental Gerontology*, **2013**, 48, 881-7	4.5	90
388	Age-related remodeling of neuromuscular junctions on type-identified diaphragm fibers. *Muscle and Nerve*, **1998**, 21, 887-95	3.4	84
387	Metabolic and phenotypic adaptations of diaphragm muscle fibers with inactivation. *Journal of Applied Physiology*, **1997**, 82, 1145-53	3.7	83
386	[Ca2+]i reduction increases cellular proliferation and apoptosis in vascular smooth muscle cells: relevance to the ADPKD phenotype. *Circulation Research*, **2005**, 96, 873-80	15.7	81
385	Lymphocyte function-associated antigen 1 is a receptor for Pasteurella haemolytica leukotoxin in bovine leukocytes. *Infection and Immunity*, **2000**, 68, 72-9	3.7	81
384	Motoneuron BDNF/TrkB signaling enhances functional recovery after cervical spinal cord injury. *Experimental Neurology*, **2013**, 247, 101-9	5.7	80
383	Phrenic motoneuron morphology during rapid diaphragm muscle growth. *Journal of Applied Physiology*, **2000**, 89, 563-72	3.7	79
382	Inactivity-induced remodeling of neuromuscular junctions in rat diaphragmatic muscle. *Muscle and Nerve*, **1999**, 22, 307-19	3.4	77
381	Development of sinus arrhythmia during sleeping and waking states in normal infants. *Sleep*, **1978**, 1, 33-48	1.1	77
380	PHYSIOLOGICAL EFFECTS OF DIAPHRAGM MUSCLE DENERVATION AND DISUSE. *Clinics in Chest Medicine*, **1994**, 15, 641-659	5.3	76
379	Force-calcium relationship depends on myosin heavy chain and troponin isoforms in rat diaphragm muscle fibers. *Journal of Applied Physiology*, **1999**, 87, 1894-900	3.7	75
378	Neurotrophins improve neuromuscular transmission in the adult rat diaphragm. *Muscle and Nerve*, **2004**, 29, 381-6	3.4	74
377	The role of cyclic-ADP-ribose-signaling pathway in oxytocin-induced Ca2+ transients in human myometrium cells. *Endocrinology*, **2004**, 145, 881-9	4.8	70
376	Wireless Instantaneous Neurotransmitter Concentration System-based amperometric detection of dopamine, adenosine, and glutamate for intraoperative neurochemical monitoring. *Journal of Neurosurgery*, **2009**, 111, 701-11	3.2	69
375	Effect of proinflammatory cytokines on regulation of sarcoplasmic reticulum Ca2+ reuptake in human airway smooth muscle. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2009**, 297, L26-34	5.8	69

374	Diaphragm Muscle: Structural and Functional Organization. *Clinics in Chest Medicine*, **1988**, 9, 195-210	5.3	69
373	Phrenic motor unit recruitment during ventilatory and non-ventilatory behaviors. *Respiratory Physiology and Neurobiology*, **2011**, 179, 57-63	2.8	68
372	Fiber type composition of muscle units in the cat diaphragm. *Neuroscience Letters*, **1989**, 97, 29-34	3.3	68
371	Congestive heart failure: differential adaptation of the diaphragm and latissimus dorsi. *Journal of Applied Physiology*, **1995**, 79, 389-97	3.7	65
370	Synaptic vesicle pools at diaphragm neuromuscular junctions vary with motoneuron soma, not axon terminal, inactivity. *Neuroscience*, **2007**, 146, 178-89	3.9	62
369	Localized delivery of brain-derived neurotrophic factor-expressing mesenchymal stem cells enhances functional recovery following cervical spinal cord injury. *Journal of Neurotrauma*, **2015**, 32, 185-93	5.4	61
368	Cross-bridge cycling kinetics, actomyosin ATPase activity and myosin heavy chain isoforms in skeletal and smooth respiratory muscles. *Comparative Biochemistry and Physiology - B Biochemistry and Molecular Biology*, **1998**, 119, 435-50	2.3	61
367	Invited review: significance of spatial and temporal heterogeneity of calcium transients in smooth muscle. *Journal of Applied Physiology*, **2001**, 91, 488-96	3.7	61
366	F-actin stabilization increases tension cost during contraction of permeabilized airway smooth muscle in dogs. *Journal of Physiology*, **1999**, 519 Pt 2, 527-38	3.9	59
365	Changes in cardiovascular beta-adrenoceptor responses during hypothermia. *Cryobiology*, **2008**, 57, 246-50	2.7	58
364	Denervation effects on myonuclear domain size of rat diaphragm fibers. *Journal of Applied Physiology*, **2006**, 100, 1617-22	3.7	58
363	Caveolin-1 regulation of store-operated Ca(2+) influx in human airway smooth muscle. *European Respiratory Journal*, **2012**, 40, 470-8	13.6	57
362	Invited review: Mechanisms underlying motor unit plasticity in the respiratory system. *Journal of Applied Physiology*, **2003**, 94, 1230-41	3.7	57
361	Structure-activity relationships in rodent diaphragm muscle fibers vs. neuromuscular junctions. *Respiratory Physiology and Neurobiology*, **2012**, 180, 88-96	2.8	56
360	Age-related changes in diaphragm muscle contractile properties and myosin heavy chain isoforms. *American Journal of Respiratory and Critical Care Medicine*, **1994**, 150, 174-8	10.2	56
359	Recruitment of rat diaphragm motor units across motor behaviors with different levels of diaphragm activation. *Journal of Applied Physiology*, **2014**, 117, 1308-16	3.7	54
358	Mechanical properties of respiratory muscles. *Comprehensive Physiology*, **2013**, 3, 1553-67	7.7	54
357	Targeted delivery of TrkB receptor to phrenic motoneurons enhances functional recovery of rhythmic phrenic activity after cervical spinal hemisection. *PLoS ONE*, **2013**, 8, e64755	3.7	53

356	Cross-bridge kinetics in respiratory muscles. *European Respiratory Journal*, **1997**, 10, 2147-58	13.6	53
355	Spatial and temporal aspects of ACh-induced [Ca2+]i oscillations in porcine tracheal smooth muscle. *Cell Calcium*, **2000**, 27, 153-62	4	53
354	Effect of unilateral denervation on maximum specific force in rat diaphragm muscle fibers. *Journal of Applied Physiology*, **2001**, 90, 1196-204	3.7	52
353	Pneumotaxic area neuronal discharge during sleep-waking states in the cat. *Experimental Neurology* , **1980**, 67, 79-102	5.7	52
352	Functional impact of diaphragm muscle sarcopenia in both male and female mice. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2015**, 309, L46-52	5.8	51
351	Mechanisms underlying increased force generation by rat diaphragm muscle fibers during development. *Journal of Applied Physiology*, **2001**, 90, 380-8	3.7	51
350	Prolonged C2 spinal hemisection-induced inactivity reduces diaphragm muscle specific force with modest, selective atrophy of type IIx and/or IIb fibers. *Journal of Applied Physiology*, **2013**, 114, 380-6	3.7	50
349	Non-random distribution and sensory functions of primary cilia in vascular smooth muscle cells. *Kidney and Blood Pressure Research*, **2008**, 31, 171-84	3.1	50
348	Pasteurella haemolytica leukotoxin and endotoxin induced cytokine gene expression in bovine alveolar macrophages requires NF-kappaB activation and calcium elevation. *Microbial Pathogenesis*, **1999**, 26, 263-73	3.8	50
347	Functional impact of sarcopenia in respiratory muscles. *Respiratory Physiology and Neurobiology*, **2016**, 226, 137-46	2.8	49
346	Chronic assessment of diaphragm muscle EMG activity across motor behaviors. *Respiratory Physiology and Neurobiology*, **2011**, 177, 176-82	2.8	48
345	The ventilatory muscles. Fatigue, endurance and training. *Chest*, **1982**, 82, 761-6	5.3	48
344	Quantifying passive muscle stiffness in children with and without cerebral palsy using ultrasound shear wave elastography. *Developmental Medicine and Child Neurology*, **2016**, 58, 1288-1294	3.3	47
343	Inflammation alters regional mitochondrial Ca□+ in human airway smooth muscle cells. *American Journal of Physiology - Cell Physiology*, **2012**, 303, C244-56	5.4	47
342	Regulation of store-operated Ca2+ entry by CD38 in human airway smooth muscle. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2008**, 294, L378-85	5.8	47
341	Ageing and neurotrophic signalling effects on diaphragm neuromuscular function. *Journal of Physiology*, **2015**, 593, 431-40	3.9	46
340	Neuromuscular adaptations to respiratory muscle inactivity. *Respiratory Physiology and Neurobiology*, **2009**, 169, 133-40	2.8	46
339	Sleep influences on diaphragmatic motor unit discharge. *Experimental Neurology*, **1984**, 85, 316-35	5.7	46

338	Breathing: Motor Control of Diaphragm Muscle. *Physiology*, **2018**, 33, 113-126	9.8	45
337	Systems biology of skeletal muscle: fiber type as an organizing principle. *Wiley Interdisciplinary Reviews: Systems Biology and Medicine*, **2012**, 4, 457-73	6.6	45
336	Phrenic motor neuron loss in aged rats. *Journal of Neurophysiology*, **2018**, 119, 1852-1862	3.2	44
335	The effect of denervation on protein synthesis and degradation in adult rat diaphragm muscle. *Journal of Applied Physiology*, **2009**, 107, 438-44	3.7	44
334	ATP consumption rate per cross bridge depends on myosin heavy chain isoform. *Journal of Applied Physiology*, **2003**, 94, 2188-96	3.7	44
333	Reserve capacity for ATP consumption during isometric contraction in human skeletal muscle fibers. *Journal of Applied Physiology*, **2001**, 90, 657-64	3.7	44
332	Quantitative determination of calcium-activated myosin adenosine triphosphatase activity in rat skeletal muscle fibres. *The Histochemical Journal*, **1992**, 24, 431-44		44
331	Synaptic vesicle distribution and release at rat diaphragm neuromuscular junctions. *Journal of Neurophysiology*, **2007**, 98, 478-87	3.2	43
330	Denervation-induced changes in myosin heavy chain expression in the rat diaphragm muscle. *Journal of Applied Physiology*, **2003**, 95, 611-9	3.7	43
329	Isotonic contractile and fatigue properties of developing rat diaphragm muscle. *Journal of Applied Physiology*, **1998**, 84, 1260-8	3.7	43
328	Key aspects of phrenic motoneuron and diaphragm muscle development during the perinatal period. *Journal of Applied Physiology*, **2008**, 104, 1818-27	3.7	42
327	Neuromuscular transmission failure during postnatal development. *Neuroscience Letters*, **1991**, 125, 34-6	3.3	42
326	A novel and selective poly (ADP-ribose) polymerase inhibitor ameliorates chemotherapy-induced painful neuropathy. *PLoS ONE*, **2013**, 8, e54161	3.7	42
325	Feasibility and reliability of quantifying passive muscle stiffness in young children by using shear wave ultrasound elastography. *Journal of Ultrasound in Medicine*, **2015**, 34, 663-70	2.9	41
324	Corticosteroid effects on isotonic contractile properties of rat diaphragm muscle. *Journal of Applied Physiology*, **1997**, 83, 1062-7	3.7	41
323	Non-stationarity and power spectral shifts in EMG activity reflect motor unit recruitment in rat diaphragm muscle. *Respiratory Physiology and Neurobiology*, **2013**, 185, 400-9	2.8	40
322	Respiratory muscle plasticity. *Respiratory Physiology and Neurobiology*, **2005**, 147, 235-51	2.8	40
321	Subcellular localization of cyclic ADP-ribosyl cyclase and cyclic ADP-ribose hydrolase activities in porcine airway smooth muscle. *Biochimica Et Biophysica Acta - Molecular Cell Research*, **2000**, 1498, 64-71	4.9	40

320	Analysis of muscle fiber clustering in the diaphragm muscle of sarcopenic mice. *Muscle and Nerve*, **2015**, 52, 76-82	3.4	39
319	TrkB kinase activity maintains synaptic function and structural integrity at adult neuromuscular junctions. *Journal of Applied Physiology*, **2014**, 117, 910-20	3.7	39
318	Phrenic motoneuron expression of serotonergic and glutamatergic receptors following upper cervical spinal cord injury. *Experimental Neurology*, **2012**, 234, 191-9	5.7	39
317	Characterization of primary cilia in human airway smooth muscle cells. *Chest*, **2009**, 136, 561-570	5.3	39
316	Pkd2+/- vascular smooth muscles develop exaggerated vasocontraction in response to phenylephrine stimulation. *Journal of the American Society of Nephrology: JASN*, **2007**, 18, 485-93	12.7	39
315	Effects of hypothyroidism on maximum specific force in rat diaphragm muscle fibers. *Journal of Applied Physiology*, **2002**, 92, 1506-14	3.7	39
314	Sodium-calcium exchange in intracellular calcium handling of human airway smooth muscle. *PLoS ONE*, **2011**, 6, e23662	3.7	39
313	Role of neurotrophins in recovery of phrenic motor function following spinal cord injury. *Respiratory Physiology and Neurobiology*, **2009**, 169, 218-25	2.8	38
312	Morphological adaptations of neuromuscular junctions depend on fiber type. *Applied Physiology, Nutrition, and Metabolism*, **1997**, 22, 197-230		38
311	Impact of aging on diaphragm muscle function in male and female Fischer 344 rats. *Physiological Reports*, **2018**, 6, e13786	2.6	37
310	TrkB kinase activity is critical for recovery of respiratory function after cervical spinal cord hemisection. *Experimental Neurology*, **2014**, 261, 190-5	5.7	37
309	Cyclic nucleotide regulation of store-operated Ca2+ influx in airway smooth muscle. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2006**, 290, L278-83	5.8	37
308	Respiratory inhibition induced by transient hypertension during sleep in unrestrained cats. *Experimental Neurology*, **1985**, 90, 173-86	5.7	37
307	Hyperoxia-induced Cellular Senescence in Fetal Airway Smooth Muscle Cells. *American Journal of Respiratory Cell and Molecular Biology*, **2019**, 61, 51-60	5.7	37
306	Mechanisms underlying hypothermia-induced cardiac contractile dysfunction. *American Journal of Physiology - Heart and Circulatory Physiology*, **2010**, 298, H890-7	5.2	36
305	Neuregulin-1 at synapses on phrenic motoneurons. *Journal of Comparative Neurology*, **2010**, 518, 4213-25	3.4	36
304	Nitric oxide impairs Ca2+ activation and slows cross-bridge cycling kinetics in skeletal muscle. *Journal of Applied Physiology*, **2001**, 91, 2233-9	3.7	35
303	Safety factor for neuromuscular transmission at type-identified diaphragm fibers. *Muscle and Nerve* , **2007**, 35, 800-3	3.4	34

302	Mechanisms underlying myosin heavy chain expression during development of the rat diaphragm muscle. *Journal of Applied Physiology*, **2006**, 101, 1546-55	3.7	33
301	Invited Review: plasticity and energetic demands of contraction in skeletal and cardiac muscle. *Journal of Applied Physiology*, **2001**, 90, 1158-64	3.7	33
300	Interactive effects of denervation and malnutrition on diaphragm structure and function. *Journal of Applied Physiology*, **1996**, 81, 2165-72	3.7	32
299	Gender and transcriptional regulation of NO synthase and ET-1 in porcine aortic endothelial cells. *American Journal of Physiology - Heart and Circulatory Physiology*, **1997**, 273, H1962-7	5.2	31
298	Discharge of neurons in the parabrachial pons related to the cardiac cycle: changes during different sleep-waking states. *Brain Research*, **1980**, 199, 385-99	3.7	31
297	Synaptic vesicle cycling at type-identified diaphragm neuromuscular junctions. *Muscle and Nerve*, **2004**, 30, 774-83	3.4	30
296	TrkB gene therapy by adeno-associated virus enhances recovery after cervical spinal cord injury. *Experimental Neurology*, **2016**, 276, 31-40	5.7	29
295	Developmental effects on myonuclear domain size of rat diaphragm fibers. *Journal of Applied Physiology*, **2008**, 104, 787-94	3.7	29
294	Neuregulin-dependent protein synthesis in C2C12 myotubes and rat diaphragm muscle. *American Journal of Physiology - Cell Physiology*, **2006**, 291, C1056-61	5.4	29
293	Denervation alters myosin heavy chain expression and contractility of developing rat diaphragm muscle. *Journal of Applied Physiology*, **2000**, 89, 1106-13	3.7	29
292	Changes in diaphragmatic EMG spectra during hyperpneic loads. *Respiration Physiology*, **1985**, 61, 137-52		29
291	Gender and relaxation to C-type natriuretic peptide in porcine coronary arteries. *Journal of Cardiovascular Pharmacology*, **1998**, 32, 5-11	3.1	29
290	The Impact of Midcervical Contusion Injury on Diaphragm Muscle Function. *Journal of Neurotrauma*, **2016**, 33, 500-9	5.4	29
289	Diaphragm muscle function following midcervical contusion injury in rats. *Journal of Applied Physiology*, **2019**, 126, 221-230	3.7	29
288	Diaphragm neuromuscular transmission failure in aged rats. *Journal of Neurophysiology*, **2019**, 122, 93-104	3.2	28
287	Evolution and Functional Differentiation of the Diaphragm Muscle of Mammals. *Comprehensive Physiology*, **2019**, 9, 715-766	7.7	28
286	Interaction between endoplasmic/sarcoplasmic reticulum stress (ER/SR stress), mitochondrial signaling and Ca(2+) regulation in airway smooth muscle (ASM). *Canadian Journal of Physiology and Pharmacology*, **2015**, 93, 97-110	2.4	28
285	Role of TrkB kinase activity in aging diaphragm neuromuscular junctions. *Experimental Gerontology*, **2015**, 72, 184-91	4.5	28

284	Caveolin-1 knockout mice exhibit airway hyperreactivity. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2012**, 303, L669-81	5.8	28
283	Endoplasmic Reticulum Stress and Mitochondrial Function in Airway Smooth Muscle. *Frontiers in Cell and Developmental Biology*, **2019**, 7, 374	5.7	27
282	Intracellular signaling pathways regulating net protein balance following diaphragm muscle denervation. *American Journal of Physiology - Cell Physiology*, **2011**, 300, C318-27	5.4	27
281	Trophic factor expression in phrenic motor neurons. *Respiratory Physiology and Neurobiology*, **2008**, 164, 252-62	2.8	27
280	Effect of mechanical ventilation on the diaphragm. *New England Journal of Medicine*, **2008**, 358, 1392-4	59.2	27
279	Regulation of sarcoplasmic reticulum Ca2+ reuptake in porcine airway smooth muscle. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2008**, 294, L787-96	5.8	27
278	Oxandrolone enhances skeletal muscle myosin synthesis and alters global gene expression profile in Duchenne muscular dystrophy. *American Journal of Physiology - Endocrinology and Metabolism*, **2006**, 290, E530-9	6	27
277	Store-operated Ca2+ influx in airway smooth muscle: Interactions between volatile anesthetic and cyclic nucleotide effects. *Anesthesiology*, **2006**, 105, 976-83	4.3	27
276	Diaphragm electromyographic activity following unilateral midcervical contusion injury in rats. *Journal of Neurophysiology*, **2017**, 117, 545-555	3.2	26
275	Functional recovery after cervical spinal cord injury: Role of neurotrophin and glutamatergic signaling in phrenic motoneurons. *Respiratory Physiology and Neurobiology*, **2016**, 226, 128-36	2.8	26
274	Novel method for transdiaphragmatic pressure measurements in mice. *Respiratory Physiology and Neurobiology*, **2013**, 188, 56-9	2.8	26
273	Effects of volatile anesthetics on store-operated Ca(2+) influx in airway smooth muscle. *Anesthesiology*, **2004**, 101, 373-80	4.3	26
272	Impact of unilateral denervation on transdiaphragmatic pressure. *Respiratory Physiology and Neurobiology*, **2015**, 210, 14-21	2.8	25
271	Convergence of pattern generator outputs on a common mechanism of diaphragm motor unit recruitment. *Progress in Brain Research*, **2014**, 209, 309-29	2.9	25
270	Power fatigue of the rat diaphragm muscle. *Journal of Applied Physiology*, **2000**, 89, 2215-9	3.7	25
269	Volume measurements in confocal microscopy. *Methods in Enzymology*, **1999**, 307, 296-315	1.7	25
268	Effects of the inflammatory cytokines TNF-and IL-13 on stromal interaction molecule-1 aggregation in human airway smooth muscle intracellular Ca(2+) regulation. *American Journal of Respiratory Cell and Molecular Biology*, **2013**, 49, 601-8	5.7	24
267	EMG-based detection of inspiration in the rat diaphragm muscle. *Annual International Conference of the IEEE Engineering in Medicine and Biology Society*, **2006**, 2006, 1204-7		24

266	Elevated blood pressure and cardiac hypertrophy after ablation of the gly96/IEX-1 gene. *Journal of Applied Physiology*, **2006**, 100, 707-16	3.7	24
265	Influence of corticosteroids on myonuclear domain size in the rat diaphragm muscle. *Journal of Applied Physiology*, **2004**, 97, 1715-22	3.7	24
264	Temporal aspects of excitation-contraction coupling in airway smooth muscle. *Journal of Applied Physiology*, **2001**, 91, 2266-74	3.7	24
263	Diaphragm muscle sarcopenia in Fischer 344 and Brown Norway rats. *Experimental Physiology*, **2016** , 101, 883-94	2.4	24
262	BDNF effects on functional recovery across motor behaviors after cervical spinal cord injury. *Journal of Neurophysiology*, **2017**, 117, 537-544	3.2	23
261	Impact of sarcopenia on diaphragm muscle fatigue. *Experimental Physiology*, **2019**, 104, 1090-1099	2.4	23
260	Functional Effects of Cigarette Smoke-Induced Changes in Airway Smooth Muscle Mitochondrial Morphology. *Journal of Cellular Physiology*, **2017**, 232, 1053-1068	7	23
259	Motoneuron glutamatergic receptor expression following recovery from cervical spinal hemisection. *Journal of Comparative Neurology*, **2017**, 525, 1192-1205	3.4	23
258	Spatial and temporal aspects of calcium sparks in porcine tracheal smooth muscle cells. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **1999**, 277, L1018-25	5.8	23
257	Diaphragm Motor Units and Their Response to Altered Use. *Seminars in Respiratory and Critical Care Medicine*, **1991**, 12, 258-269	3.9	23
256	Aging-related changes in respiratory system mechanics and morphometry in mice. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2016**, 311, L167-76	5.8	23
255	Compensatory effects following unilateral diaphragm paralysis. *Respiratory Physiology and Neurobiology*, **2017**, 246, 39-46	2.8	22
254	Myosin heavy chain transitions during development. Functional implications for the respiratory musculature. *Comparative Biochemistry and Physiology - B Biochemistry and Molecular Biology*, **1998**, 119, 459-70	2.3	22
253	Changes in actomyosin ATP consumption rate in rat diaphragm muscle fibers during postnatal development. *Journal of Applied Physiology*, **2003**, 94, 1896-902	3.7	22
252	Role of CD38 in myometrial Ca2+ transients: modulation by progesterone. *American Journal of Physiology - Endocrinology and Metabolism*, **2004**, 287, E1142-8	6	21
251	Alterations in diaphragm contractility after nandrolone administration: an analysis of potential mechanisms. *Journal of Applied Physiology*, **1999**, 86, 985-92	3.7	21
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249	Discharge correlations between neurons in the nucleus parabrachialis medialis during sleep-waking states. *Brain Research*, **1980**, 199, 343-58	3.7	21

248	A novel approach for targeted delivery to motoneurons using cholera toxin-B modified protocells. *Journal of Neuroscience Methods*, **2016**, 273, 160-174	3	21
247	Correlation of respiratory activity of contralateral diaphragm muscles for evaluation of recovery following hemiparesis. *Annual International Conference of the IEEE Engineering in Medicine and Biology Society IEEE Engineering in Medicine and Biology Society Annual International Conference*, **2009**, 2009, 404-7	0.9	20
246	Exogenous testosterone treatment decreases diaphragm neuromuscular transmission failure in male rats. *Journal of Applied Physiology*, **2001**, 90, 850-6	3.7	20
245	Metabolic variability within individual fibres of the cat tibialis posterior and diaphragm muscles. *The Histochemical Journal*, **1991**, 23, 366-74		20
244	A Critical Evaluation of Current Concepts in Cerebral Palsy. *Physiology*, **2019**, 34, 216-229	9.8	19
243	cADP ribose and [Ca(2+)](i) regulation in rat cardiac myocytes. *American Journal of Physiology - Heart and Circulatory Physiology*, **2000**, 279, H1482-9	5.2	19
242	Absence of myofibrillar creatine kinase and diaphragm isometric function during repetitive activation. *Journal of Applied Physiology*, **1998**, 84, 1166-73	3.7	19
241	Hypothyroidism alters diaphragm muscle development. *Journal of Applied Physiology*, **1996**, 81, 1965-72	3.7	19
240	Prepubertal cyclicity in feeding behavior and body weight regulation in the female rat. *Physiology and Behavior*, **1977**, 18, 299-305	3.5	19
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238	Hypothermia/rewarming disrupts excitation-contraction coupling in cardiomyocytes. *American Journal of Physiology - Heart and Circulatory Physiology*, **2016**, 310, H1533-40	5.2	18
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236	Endovascular treatment of experimental aneurysms by use of fibroblast-coated platinum coils: an angiographic and histopathologic study. *Stroke*, **2007**, 38, 170-6	6.7	18
235	Mechanisms underlying greater sensitivity of neonatal cardiac muscle to volatile anesthetics. *Anesthesiology*, **2002**, 96, 893-906	4.3	18
234	Differences in lumbar motor neuron pruning in an animal model of early onset spasticity. *Journal of Neurophysiology*, **2018**, 120, 601-609	3.2	18
233	TNF decreases mitochondrial movement in human airway smooth muscle. *American Journal of Physiology - Lung Cellular and Molecular Physiology*, **2017**, 313, L166-L176	5.8	17
232	Chronic TrkB agonist treatment in old age does not mitigate diaphragm neuromuscular dysfunction. *Physiological Reports*, **2017**, 5, e13103	2.6	17
231	Inflammation, caveolae and CD38-mediated calcium regulation in human airway smooth muscle. *Biochimica Et Biophysica Acta - Molecular Cell Research*, **2014**, 1843, 346-51	4.9	17

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