Thomas E Dick

List of Publications by Citations

67 papers	1,912 citations	26 h-index	43 g-index
70 ext. papers	2,143 ext. citations	3.2 avg, IF	4.74 L-index

#	Paper	IF	Citations
67	Pontine mechanisms of respiratory control. *Comprehensive Physiology*, **2012**, 2, 2443-69	7.7	152
66	Modeling the ponto-medullary respiratory network. *Respiratory Physiology and Neurobiology*, **2004**, 143, 307-19	2.8	125
65	Cardiovascular alterations by chronic intermittent hypoxia: importance of carotid body chemoreflexes. *Clinical and Experimental Pharmacology and Physiology*, **2005**, 32, 447-9	3	116
64	Acute intermittent hypoxia increases both phrenic and sympathetic nerve activities in the rat. *Experimental Physiology*, **2007**, 92, 87-97	2.4	107
63	Pontine respiratory neurons in anesthetized cats. *Brain Research*, **1994**, 636, 259-69	3.7	102
62	Systemic, cellular and molecular analysis of chemoreflex-mediated sympathoexcitation by chronic intermittent hypoxia. *Experimental Physiology*, **2007**, 92, 39-44	2.4	81
61	Ventrolateral pons mediates short-term depression of respiratory frequency after brief hypoxia. *Respiration Physiology*, **2000**, 121, 87-100		74
60	Cardiorespiratory coupling: common rhythms in cardiac, sympathetic, and respiratory activities. *Progress in Brain Research*, **2014**, 209, 191-205	2.9	71
59	Effect of baroreceptor stimulation on the respiratory pattern: insights into respiratory-sympathetic interactions. *Respiratory Physiology and Neurobiology*, **2010**, 174, 135-45	2.8	67
58	Functional connectivity in the pontomedullary respiratory network. *Journal of Neurophysiology*, **2008**, 100, 1749-69	3.2	66
57	Learning to breathe: control of the inspiratory-expiratory phase transition shifts from sensory- to central-dominated during postnatal development in rats. *Journal of Physiology*, **2009**, 587, 4931-48	3.9	63
56	Pontomedullary transection attenuates central respiratory modulation of sympathetic discharge, heart rate and the baroreceptor reflex in the in situ rat preparation. *Experimental Physiology*, **2008**, 93, 803-16	2.4	61
55	Prolongation in expiration evoked from ventrolateral pons of adult rats. *Journal of Applied Physiology*, **1997**, 82, 377-81	3.7	59
54	Entrainment pattern between sympathetic and phrenic nerve activities in the Sprague-Dawley rat: hypoxia-evoked sympathetic activity during expiration. *American Journal of Physiology - Regulatory Integrative and Comparative Physiology*, **2004**, 286, R1121-8	3.2	56
53	Cardio-respiratory coupling depends on the pons. *Respiratory Physiology and Neurobiology*, **2009**, 168, 76-85	2.8	45
52	A method for analyzing temporal patterns of variability of a time series from Poincare plots. *Journal of Applied Physiology*, **2012**, 113, 297-306	3.7	45
51	Control of breathing by interacting pontine and pulmonary feedback loops. *Frontiers in Neural Circuits*, **2013**, 7, 16	3.5	37

50	Linking Inflammation, Cardiorespiratory Variability, and Neural Control in Acute Inflammation via Computational Modeling. *Frontiers in Physiology*, **2012**, 3, 222	4.6	35
49	Quantitative analysis of cardiovascular modulation in respiratory neural activity. *Journal of Physiology*, **2004**, 556, 959-70	3.9	35
48	Pontine respiratory-modulated activity before and after vagotomy in decerebrate cats. *Journal of Physiology*, **2008**, 586, 4265-82	3.9	33
47	Increased cardio-respiratory coupling evoked by slow deep breathing can persist in normal humans. *Respiratory Physiology and Neurobiology*, **2014**, 204, 99-111	2.8	32
46	Kllliker-Fuse nuclei regulate respiratory rhythm variability via a gain-control mechanism. *American Journal of Physiology - Regulatory Integrative and Comparative Physiology*, **2017**, 312, R172-R188	3.2	29
45	Diaphragm activation via high frequency spinal cord stimulation in a rodent model of spinal cord injury. *Experimental Neurology*, **2013**, 247, 689-93	5.7	29
44	Increasing Local Excitability of Brainstem Respiratory Nuclei Reveals a Distributed Network Underlying Respiratory Motor Pattern Formation. *Frontiers in Physiology*, **2019**, 10, 887	4.6	28
43	Lung and brainstem cytokine levels are associated with breathing pattern changes in a rodent model of acute lung injury. *Respiratory Physiology and Neurobiology*, **2011**, 178, 429-38	2.8	28
42	Effects of baroreceptor activation on respiratory variability in rat. *Respiratory Physiology and Neurobiology*, **2009**, 166, 80-6	2.8	27
41	Arterial pulse modulated activity is expressed in respiratory neural output. *Journal of Applied Physiology*, **2005**, 99, 691-8	3.7	25
40	Pontine-ventral respiratory column interactions through raphe circuits detected using multi-array spike train recordings. *Journal of Neurophysiology*, **2009**, 101, 2943-60	3.2	24
39	Physiological and pathophysiological interactions between the respiratory central pattern generator and the sympathetic nervous system. *Progress in Brain Research*, **2014**, 212, 1-23	2.9	23
38	Blockade of dorsolateral pontine 5HT1A receptors destabilizes the respiratory rhythm in C57BL6/J wild-type mice. *Respiratory Physiology and Neurobiology*, **2016**, 226, 110-4	2.8	18
37	Learning to breathe: habituation of Hering-Breuer inflation reflex emerges with postnatal brainstem maturation. *Respiratory Physiology and Neurobiology*, **2014**, 195, 44-9	2.8	18
36	Quantifying interactions between real oscillators with information theory and phase models: application to cardiorespiratory coupling. *Physical Review E*, **2013**, 87, 022709	2.4	17
35	Respiratory responses to tracheobronchial stimulation during sleep and wakefulness in the adult cat. *Sleep*, **1996**, 19, 472-8	1.1	17
34	Volumetric mapping of the functional neuroanatomy of the respiratory network in the perfused brainstem preparation of rats. *Journal of Physiology*, **2020**, 598, 2061-2079	3.9	16
33	A role for NMDA receptors in posthypoxic frequency decline in the rat. *American Journal of Physiology - Regulatory Integrative and Comparative Physiology*, **1998**, 274, R1546-55	3.2	16

32	Effects of ion channel noise on neural circuits: an application to the respiratory pattern generator to investigate breathing variability. *Journal of Neurophysiology*, **2017**, 117, 230-242	3.2	13
31	Swallowing in sleep and wakefulness in adult cats. *Sleep*, **1995**, 18, 325-9	1.1	13
30	Cardio-ventilatory coupling in young healthy resting subjects. *Journal of Applied Physiology*, **2012**, 112, 1248-57	3.7	12
29	Decreased Hering-Breuer input-output entrainment in a mouse model of Rett syndrome. *Frontiers in Neural Circuits*, **2013**, 7, 42	3.5	12
28	Functional connectivity in raphÉpontomedullary circuits supports active suppression of breathing during hypocapnic apnea. *Journal of Neurophysiology*, **2015**, 114, 2162-86	3.2	11
27	Brainstem inflammation modulates the ventilatory pattern and its variability after acute lung injury in rodents. *Journal of Physiology*, **2020**, 598, 2791-2811	3.9	10
26	Lung-injury depresses glutamatergic synaptic transmission in the nucleus tractus solitarii via discrete age-dependent mechanisms in neonatal rats. *Brain, Behavior, and Immunity*, **2018**, 70, 398-422	16.6	10
25	Pontine GABAergic pathways: role and plasticity in the hypoxic ventilatory response. *Respiratory Physiology and Neurobiology*, **2004**, 143, 141-53	2.8	9
24	Adaptation to hypobaric hypoxia involves GABA A receptors in the pons. *American Journal of Physiology - Regulatory Integrative and Comparative Physiology*, **2008**, 294, R549-57	3.2	8
23	Respiratory modulation of sympathetic activity is attenuated in adult rats conditioned with chronic hypobaric hypoxia. *Respiratory Physiology and Neurobiology*, **2015**, 206, 53-60	2.8	6
22	C57BL/6J mouse apolipoprotein A2 gene is deterministic for apnea. *Respiratory Physiology and Neurobiology*, **2017**, 235, 88-94	2.8	5
21	Peripheral-to-central immune communication at the area postrema glial-barrier following bleomycin-induced sterile lung injury in adult rats. *Brain, Behavior, and Immunity*, **2020**, 87, 610-633	16.6	5
20	Ventilatory pattern variability as a biometric for severity of acute lung injury in rats. *Respiratory Physiology and Neurobiology*, **2019**, 265, 161-171	2.8	4
19	Recurrent Connections between the Pontine Respiratory Group and Ventrolateral Medullary Respiratory Column through Parallel Functional Pathways. *FASEB Journal*, **2006**, 20, A370	0.9	3
18	Traube-Hering waves are formed by interaction of respiratory sinus arrhythmia and pulse pressure modulation in healthy men. *Journal of Applied Physiology*, **2020**, 129, 1193-1202	3.7	2
17	Intrinsic Circuits of the Pontine Respiratory Group Inferred from Correlational Analysis of Large Scale Parallel Recordings. *FASEB Journal*, **2006**, 20, A370	0.9	2
16	Heartbeats entrain breathing via baroreceptor-mediated modulation of expiratory activity. *Experimental Physiology*, **2021**, 106, 1181-1195	2.4	2
15	Bifurcation of the respiratory response to lung inflation in anesthetized dogs. *Respiratory Physiology and Neurobiology*, **2017**, 244, 26-31	2.8	1

14	L-plotting: A method for visual analysis of physiological experimental and modeling multi-component data. *Neurocomputing*, **2010**, 74, 328-336	5.4	1
13	Response to: The post-inspiratory complex (PiCo), what is the evidence?. *Journal of Physiology*, **2021**, 599, 361-362	3.9	1
12	Ponto-medullary transection attenuates sympathorespiratory coupling and eliminates cardiac sinus arrhythmia in the in situ rat. *FASEB Journal*, **2008**, 22, 739.6	0.9	0
11	Periodicity: A Characteristic of Heart Rate Variability Modified by the Type of Mechanical Ventilation After Acute Lung Injury. *Frontiers in Physiology*, **2018**, 9, 772	4.6	
10	Respiratory modulation of thoracic sympathetic nerve activity increased following brief hypoxia in the rat in situ preparation. *FASEB Journal*, **2006**, 20, LB36	0.9	
9	Phase synchronization as a flexible definition of the respiratory pattern: Application to pontine-dependent control of the respiratory pattern. *FASEB Journal*, **2018**, 32, 915.2	0.9	
8	Chemoreflex Responses to LPS Exposure During a Critical Window of Development in the in situ Arterially Perfused Working Heart Brainstem Preparation. *FASEB Journal*, **2018**, 32, 742.8	0.9	
7	Preliminary Phenotypic Cluster Analysis of Cardiorespiratory Modulated Neuronal Discharge Patterns with Dynamic Visualizations. *FASEB Journal*, **2018**, 32, 893.5	0.9	
6	Modulation of mRNA Expression in Peripheral Tissue in a Rodent E. coli Sepsis Model. *FASEB Journal*, **2019**, 33, 859.5	0.9	
5	Synchrony is altered in the respiratory pattern generator following acute hypoxic challenge. *FASEB Journal*, **2010**, 24, 1042.1	0.9	
4	Evidence for distributed processing during hypoxic stimulation by the brainstem cardiorespiratory network. *FASEB Journal*, **2010**, 24, 1042.5	0.9	
3	Protection from hypoxic conditioning in juvenile rats may be related to age or conditioning duration. *FASEB Journal*, **2011**, 25, 1077.1	0.9	
2	Respiratory-Sympathetic Interactions and Central Baroreflex Pathways: Insights from Computational Modeling. *FASEB Journal*, **2011**, 25, 1076.1	0.9	
1	Cardio-respiratory Coupling is Negligible in a Rodent Septic-Model. *FASEB Journal*, **2012**, 26, 1148.5	0.9	