Kimitaka Nakazawa

List of Publications by Year
in descending order

123	1,758	331670 21	395702 33
papers	citations	h-index	g-index

129	129	129	1560
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Differences in activation patterns in elbow flexor muscles during isometric, concentric and eccentric contractions. European Journal of Applied Physiology and Occupational Physiology, 1993, 66, 214-220.	1.2	97
2	Distinct sets of locomotor modules control the speed and modes of human locomotion. Scientific Reports, 2016, 6, 36275.	3.3	75
3	Center of pressure velocity reflects body acceleration rather than body velocity during quiet standing. Gait and Posture, 2014, 39, 946-952.	1.4	63
4	Short- and long-latency reflex responses during different motor tasks in elbow flexor muscles. Experimental Brain Research, 1997, 116, 20-28.	1.5	59
5	Differences in recruitment properties of the corticospinal pathway between lengthening and shortening contractions in human soleus muscle. Brain Research, 2003, 977, 169-179.	2.2	49
6	Effects of loading and unloading of lower limb joints on the soleus H-reflex in standing humans. Clinical Neurophysiology, 2004, 115, 1296-1304.	1.5	49
7	Difference in Postural Control during Quiet Standing between Young Children and Adults: Assessment with Center of Mass Acceleration. PLoS ONE, 2015, 10, e0140235.	2.5	49
8	Muscle synergies reveal impaired trunk muscle coordination strategies in individuals with thoracic spinal cord injury. Journal of Electromyography and Kinesiology, 2017, 36, 40-48.	1.7	44
9	Functional roles of lower-limb joint moments while walking in water. Clinical Biomechanics, 2005, 20, 194-201.	1.2	43
10	On the reflex mechanisms of cervical transcutaneous spinal cord stimulation in human subjects. Journal of Neurophysiology, 2019, 121, 1672-1679.	1.8	39
11	Enhanced Stretch Reflex Excitability of the Soleus Muscle in Persons With Incomplete Rather Than Complete Chronic Spinal Cord Injury. Archives of Physical Medicine and Rehabilitation, 2006, 87, 71-75.	0.9	38
12	Cortical Correlates of Locomotor Muscle Synergy Activation in Humans: An Electroencephalographic Decoding Study. IScience, 2019, 15, 623-639.	4.1	37
13	Ankle muscle co-contractions during quiet standing are associated with decreased postural steadiness in the elderly. Gait and Posture, 2017, 55, 31-36.	1.4	36
14	Characteristics of the gait adaptation process due to split-belt treadmill walking under a wide range of right-left speed ratios in humans. PLoS ONE, 2018, 13, e0194875.	2.5	36
15	Selective activation and deactivation of the human brain structures between speeded and precisely timed tapping responses to identical visual stimulus: an fMRI study. NeuroImage, 2004, 22, 1291-1301.	4.2	33
16	Effect of sensory inputs on the soleus H-reflex amplitude during robotic passive stepping in humans. Experimental Brain Research, 2010, 202, 385-395.	1.5	33
17	Actionâ€“perception coordination dynamics of whole-body rhythmic movement in stance: A comparison study of street dancers and non-dancers. Neuroscience Letters, 2013, 544, 157-162.	2.1	31
18	Why brain-controlled neuroprosthetics matter: mechanisms underlying electrical stimulation of muscles and nerves in rehabilitation. BioMedical Engineering OnLine, 2020, 19, 81.	2.7	31

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19	Effects of limb loading on the lower-limb electromyographic activity during orthotic locomotion in a paraplegic patient. Neuroscience Letters, 1999, 274, 211-213.	2.1	28
20	Behavioral effect of knee joint motion on body's center of mass during human quiet standing. Gait and Posture, 2015, 41, 291-294.	1.4	26
21	Neural effects of muscle stretching on the spinal reflexes in multiple lower-limb muscles. PLoS ONE, 2017, 12, e0180275.	2.5	26
22	Phase dependent modulation of cortical activity during action observation and motor imagery of walking: An EEG study. NeuroImage, 2021, 225, 117486.	4.2	25
23	Gaitâ€phaseâ€dependent and gaitâ€phaseâ€independent cortical activity across multiple regions involved in voluntary gait modifications in humans. European Journal of Neuroscience, 2021, 54, 8092-8105.	2.6	23
24	Selectivity and excitability of upper-limb muscle activation during cervical transcutaneous spinal cord stimulation in humans. Journal of Applied Physiology, 2021, 131, 746-759.	2.5	23
25	Invariable H-reflex and sustained facilitation of stretch reflex with heightened sympathetic outflow. Journal of Electromyography and Kinesiology, 2009, 19, 1053-1060.	1.7	21
26	Pitching form determines probabilistic structure of errors in pitch location. Journal of Sports Sciences, 2017, 35, 2142-2147.	2.0	21
27	Postural regulatory strategies during quiet sitting are affected in individuals with thoracic spinal cord injury. Gait and Posture, 2017, 58, 446-452.	1.4	21
28	Difference in phase modulation of corticospinal excitability during the observation of the action of walking, with and without motor imagery. NeuroReport, 2018, 29, 169-173.	1.2	21
29	Speed dependency in Î±-motoneuron activity and locomotor modules in human locomotion: indirect evidence for phylogenetically conserved spinal circuits. Proceedings of the Royal Society B: Biological Sciences, 2017, 284, 20170290.	2.6	20
30	Short-term inhibition of spinal reflexes in multiple lower limb muscles after neuromuscular electrical stimulation of ankle plantar flexors. Experimental Brain Research, 2019, 237, 467-476.	1.5	20
31	Cortical reorganization of lower-limb motor representations in an elite archery athlete with congenital amputation of both arms. NeuroImage: Clinical, 2020, 25, 102144.	2.7	19
32	Effects of movement-related afferent inputs on spinal reflexes evoked by transcutaneous spinal cord stimulation during robot-assisted passive stepping. Neuroscience Letters, 2016, 627, 100-106.	2.1	18
33	Effects of neuromuscular electrical stimulation and voluntary commands on the spinal reflex excitability of remote limb muscles. Experimental Brain Research, 2019, 237, 3195-3205.	1.5	18
34	Basic locomotor muscle synergies used in land walking are finely tuned during underwater walking. Scientific Reports, 2021, 11, 18480.	3.3	17
35	Phase-dependent electromyographic activity of the lower-limb muscles of a patient with clinically complete spinal cord injury during orthotic gait. Experimental Brain Research, 1998, 120, 139-142.	1.5	16
36	Anticipatory modulation of neck muscle reflex responses induced by mechanical perturbations of the human forehead. Neuroscience Letters, 2004, 366, 206-210.	2.1	16

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37	Finger-to-Beat Coordination Skill of Non-dancers, Street Dancers, and the World Champion of a Street-Dance Competition. Frontiers in Psychology, 2016, 7, 542.	2.1	16
38	Baseball pitching accuracy: an examination of various parameters when evaluating pitch locations. Sports Biomechanics, 2017, 16, 399-410.	1.6	16
39	Differences in stretch reflex responses of elbow flexor muscles during shortening, lengthening and isometric contractions. European Journal of Applied Physiology, 1998, 77, 395-400.	2.5	15
40	Induction of locomotor-like EMG activity in paraplegic persons by orthotic gait training. Experimental Brain Research, 2004, 157, 117-123.	1.5	15
41	Changes in corticospinal excitability during observation of walking in humans. NeuroReport, 2008, 19, 727-731.	1.2	15
42	Evidence for existence of trunk-limb neural interaction in the corticospinal pathway. Neuroscience Letters, 2018, 668, 31-36.	2.1	15
43	Corticospinal Excitability Is Modulated as a Function of Postural Perturbation Predictability. Frontiers in Human Neuroscience, 2018, 12, 68.	2.0	15
44	Remote muscle contraction enhances spinal reflexes in multiple lower-limb muscles elicited by transcutaneous spinal cord stimulation. Experimental Brain Research, 2019, 237, 1793-1803.	1.5	14
45	Relationship Between Muscle Cocontraction and Proficiency in Whole-Body Sensorimotor Synchronization: A Comparison Study of Street Dancers and Nondancers. Motor Control, 2013, 17, 18-33.	0.6	13
46	The Effects of Temporal and Spatial Predictions on Stretch Reflexes of Ankle Flexor and Extensor Muscles While Standing. PLoS ONE, 2016, 11, e0158721.	2.5	13
47	Anticipation of direction and time of perturbation modulates the onset latency of trunk muscle responses during sitting perturbations. Journal of Electromyography and Kinesiology, 2016, 26, 94-101.	1.7	13
48	Speed-dependent and mode-dependent modulations of spatiotemporal modules in human locomotion extracted via tensor decomposition. Scientific Reports, 2020, 10, 680.	3.3	13
49	Cortical Re-organization After Traumatic Brain Injury Elicited Using Functional Electrical Stimulation Therapy: A Case Report. Frontiers in Neuroscience, 2021, 15, 693861.	2.8	13
50	Enhanced stretch reflex excitability of the soleus muscle in experienced swimmers. European Journal of Applied Physiology, 2009, 105, 199-205.	2.5	12
51	Posture-related modulation of cortical excitability in the tibialis anterior muscle in humans. Brain Research, 2014, 1577, 29-35.	2.2	12
52	Influence of motor imagery on spinal reflex excitability of multiple muscles. Neuroscience Letters, 2018, 668, 55-59.	2.1	12
53	Flexible Recruitments of Fundamental Muscle Synergies in the Trunk and Lower Limbs for Highly Variable Movements and Postures. Sensors, 2021, 21, 6186.	3.8	12
54	Repeatability of spinal reflexes of lower limb muscles evoked by transcutaneous spinal cord stimulation. PLoS ONE, 2019, 14, e0214818.	2.5	11

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55	Muscle-specific movement-phase-dependent modulation of corticospinal excitability during upper-limb motor execution and motor imagery combined with virtual action observation. Neuroscience Letters, 2021, 755, 135907.	2.1	11
56	Evidence for basic units of upper limb muscle synergies underlying a variety of complex human manipulations. Journal of Neurophysiology, 2022, 127, 958-968.	1.8	11
57	Effects of breathing movement on the reduction of postural sway during postural-cognitive dual tasking. PLoS ONE, 2018, 13, e0197385.	2.5	10
58	Influence of Release Parameters on Pitch Location in Skilled Baseball Pitching. Frontiers in Sports and Active Living, 2020, 2, 36.	1.8	10
59	Effect of different preparatory states on the reflex responses of ankle flexor and extensor muscles to a sudden drop of support surface during standing in humans. Journal of Electromyography and Kinesiology, 2009, 19, 782-788.	1.7	9
60	Shortâ€term effect of electrical nerve stimulation on spinal reciprocal inhibition during robotâ€assisted passive stepping in humans. European Journal of Neuroscience, 2015, 42, 2283-2288.	2.6	9
61	Modulation of Hoffmann reflex excitability during action observation of walking with and without motor imagery. Neuroscience Letters, 2018, 684, 218-222.	2.1	9
62	Functional plasticity of the ipsilateral primary sensorimotor cortex in an elite long jumper with below-knee amputation. NeuroImage: Clinical, 2019, 23, 101847.	2.7	9
63	Interlimb neural interactions in corticospinal and spinal reflex circuits during preparation and execution of isometric elbow flexion. Journal of Neurophysiology, 2020, 124, 652-667.	1.8	9
64	Low-Intensity and Short-Duration Continuous Cervical Transcutaneous Spinal Cord Stimulation Intervention Does Not Prime the Corticospinal and Spinal Reflex Pathways in Able-Bodied Subjects. Journal of Clinical Medicine, 2021, 10, 3633.	2.4	9
65	Force Control of Ankle Dorsiflexors in Young Adults: Effects of Bilateral Control and Leg Dominance. Journal of Motor Behavior, 2020, 52, 226-235.	0.9	8
66	Robust Identification of Motor Unit Discharges From High-Density Surface EMG in Dynamic Muscle Contractions of the Tibialis Anterior. IEEE Access, 2021, 9, 123901-123911.	4.2	8
67	Different modulation pattern of spinal stretch reflex excitability in highly trained endurance runners. European Journal of Applied Physiology, 2012, 112, 3641-3648.	2.5	7
68	Short-term effects of electrical nerve stimulation on spinal reciprocal inhibition depend on gait phase during passive stepping. Journal of Electromyography and Kinesiology, 2018, 38, 151-154.	1.7	7
69	Remarkable hand grip steadiness in individuals with complete spinal cord injury. Experimental Brain Research, 2019, 237, 3175-3183.	1.5	7
70	Speed- and mode-dependent modulation of the center of mass trajectory in human gaits as revealed by Lissajous curves. Journal of Biomechanics, 2020, 110, 109947.	2.1	7
71	Velocity-dependent suppression of the soleus H-reflex during robot-assisted passive stepping. Neuroscience Letters, 2015, 584, 337-341.	2.1	6
72	Temporal, but not Directional, Prior Knowledge Shortens Muscle Reflex Latency in Response to Sudden Transition of Support Surface During Walking. Frontiers in Human Neuroscience, 2016, 10, 29.	2.0	6

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73	Presetting of the Corticospinal Excitability in the Tibialis Anterior Muscle in Relation to Prediction of the Magnitude and Direction of Postural Perturbations. Frontiers in Human Neuroscience, 2019, 13, 4.	2.0	6
74	Muscle-Specific Modulation of Spinal Reflexes in Lower-Limb Muscles during Action Observation with and without Motor Imagery of Walking. Brain Sciences, 2019, 9, 333.	2.3	6
75	Neural decoding of gait phases during motor imagery and improvement of the decoding accuracy by concurrent action observation. Journal of Neural Engineering, 2021, 18, 046099.	3.5	6
76	Neural control of human gait and posture. The Journal of Physical Fitness and Sports Medicine, 2012, 1, 263-269.	0.3	5
77	Phase-dependent modulation of corticospinal excitability during the observation of the initial phase of gait. Somatosensory & Motor Research, 2014, 31, 209-213.	0.9	5
78	Velocity-dependent transfer of adaptation in human running as revealed by split-belt treadmill adaptation. Experimental Brain Research, 2018, 236, 1019-1029.	1.5	5
79	Effect of Paired Associative Stimulation on Corticomotor Excitability in Chronic Smokers. Brain Sciences, 2019, 9, 62.	2.3	5
80	Cortical and Subcortical Neural Interactions Between Trunk and Upper-limb Muscles in Humans. Neuroscience, 2020, 451, 126-136.	2.3	5
81	Motor Point Stimulation in Spinal Paired Associative Stimulation can Facilitate Spinal Cord Excitability. Frontiers in Human Neuroscience, 2020, 14, 593806.	2.0	5
82	Specific Brain Reorganization Underlying Superior Upper Limb Motor Function After Spinal Cord Injury: A Multimodal MRI Study. Neurorehabilitation and Neural Repair, 2021, 35, 220-232.	2.9	5
83	Brain Reorganization and Neural Plasticity in Elite Athletes With Physical Impairments. Exercise and Sport Sciences Reviews, 2022, 50, 118-127.	3.0	5
84	Effects of action observation and motor imagery of walking on the corticospinal and spinal motoneuron excitability and motor imagery ability in healthy participants. PLoS ONE, 2022, 17, e0266000.	2.5	5
85	Heel strike detection using split force-plate treadmill. Gait and Posture, 2015, 41, 863-866.	1.4	4
86	Effects of anode position on the responses elicited by transcutaneous spinal cord stimulation. , 2017, 2017, 1114-1117.		4
87	Changes in corticospinal excitability during bilateral and unilateral lower-limb force control tasks. Experimental Brain Research, 2020, 238, 1977-1987.	1.5	4
88	Inter-muscle differences in modulation of motor evoked potentials and posterior root-muscle reflexes evoked from lower-limb muscles during agonist and antagonist muscle contractions. Experimental Brain Research, 2021, 239, 463-474.	1.5	4
89	Effort-dependent effects on uniform and diverse muscle activity features in skilled pitching. Scientific Reports, 2021, 11, 8211.	3.3	4
90	Control of Accuracy during Movements of High Speed: Implications from Baseball Pitching. Journal of Motor Behavior, 2022, 54, 304-315.	0.9	4

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91	Task- and Intensity-Dependent Modulation of Arm-Trunk Neural Interactions in the Corticospinal Pathway in Humans. ENeuro, 2021, 8, ENEURO.0111-21.2021.	1.9	4
92	Motor module activation sequence and topography in the spinal cord during airâ€stepping in human: Insights into the traveling wave in spinal locomotor circuits. Physiological Reports, 2017, 5, e13504.	1.7	3
93	Upper rate limits for one-to-one auditory-motor coordination involving whole-body oscillation: a study of street dancers and non-dancers. Journal of Experimental Biology, 2018, 221, .	1.7	3
94	Effects on Postural Kinematics of Performing a Cognitive Task During Upright Standing. Perceptual and Motor Skills, 2020, 127, 639-650.	1.3	3
95	Inducing lateralized phosphenes over the occipital lobe using transcranial magnetic stimulation to navigate a virtual environment. PLoS ONE, 2021, 16, e0249996.	2.5	3
96	Acquisition and maintenance of motor memory through specific motor practice over the long term as revealed by stretch reflex responses in older ballet dancers. Physiological Reports, 2020, 8, e14335.	1.7	3
97	Motor point stimulation induces more robust Fâ€waves than peripheral nerve stimulation. European Journal of Neuroscience, 2022, 55, 1614-1628.	2.6	3
98	Unique controlling mechanisms underlying walking with two handheld poles in contrast to those of conventional walking as revealed by split-belt locomotor adaptation. Experimental Brain Research, 2019, 237, 1699-1707.	1.5	2
99	â€œParalympic Brainâ€• Compensation and Reorganization of a Damaged Human Brain with Intensive Physical Training. Sports, 2020, 8, 46.	1.7	2
100	Precise force controls enhance loudness discrimination of self-generated sound. Experimental Brain Research, 2021, 239, 1141-1149.	1.5	2
101	Acquisition of novel ball-related skills associated with sports experience. Scientific Reports, 2021, 11, 12379.	3.3	2
102	The Effects of Paired Associative Stimulation with Transcutaneous Spinal Cord Stimulation on Corticospinal Excitability in Multiple Lower-limb Muscles. Neuroscience, 2021, 476, 45-59.	2.3	2
103	Neural control of muscle lengthening: Task- and muscle-specificity. The Journal of Physical Fitness and Sports Medicine, 2013, 2, 191-201.	0.3	2
104	Central Pattern Generator for Locomotion in Human Spinal Cord and Its Relevance to Locomotor Rehabilitation.. The Japanese Journal of Rehabilitation Medicine, 2003, 40, 68-75.	0.1	2
105	Effect of Long-Term Classical Ballet Dance Training on Postactivation Depression of the Soleus Hoffmann-Reflex. Motor Control, 2022, 26, 169-180.	0.6	2
106	Corticospinal excitability and somatosensory information processing of the lower limb muscle during upper limb voluntary or electrically induced muscle contractions. European Journal of Neuroscience, 2022, 55, 1810-1824.	2.6	2
107	Short-term facilitation effects elicited by cortical priming through theta burst stimulation and functional electrical stimulation of upper-limb muscles. Experimental Brain Research, 2022, , 1.	1.5	2
108	Asymmetrical Neural Adaptation in Lower Leg Muscles as a Consequence of Stereotypical Motor Training. Journal of Motor Behavior, 2012, 44, 63-68.	0.9	1

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109	Spatiotemporal characteristics of locomotor adaptation of walking with two handheld poles. Experimental Brain Research, 2020, 238, 2973-2982.	1.5	1
110	Intra-limb modulations of posterior root-muscle reflexes evoked from the lower-limb muscles during isometric voluntary contractions. Experimental Brain Research, 2021, 239, 3035-3043.	1.5	1
111	Para-Sports can Promote Functional Reorganization in the Ipsilateral Primary Motor Cortex of Lower Limbs Amputee. Neurorehabilitation and Neural Repair, 2021, 35, 1112-1123.	2.9	1
112	Development and Validation of a Closed-Loop Functional Electrical Stimulation-Based Controller for Gait Rehabilitation Using a Finite State Machine Model. IEEE Transactions on Neural Systems and Rehabilitation Engineering, 2022, 30, 1642-1651.	4.9	1
113	Method for evaluation of fractal properties from data with noisy observational errors. IEEJ Transactions on Electrical and Electronic Engineering, 2013, 8, 247-252.	1.4	0
114	Cross-sectional comparison of the probabilistic structure in the distribution of pitching location among baseball pitchers of different ages. Sports Biomechanics, 2024, 23, 81-94.	1.6	0
115	Neurophysiological Understanding of Normal and Abnormal Gait by Electromyogram and Electroencephalogram. The Japanese Journal of Rehabilitation Medicine, 2021, 58, 128-134.	0.0	0
116	Development of a robotic walking training apparatus : Development of walk system. The Proceedings of the Bioengineering Conference Annual Meeting of BED/JSME, 2003, 2003.15, 99-100.	0.0	0
117	Effects of lateral wedged insoles on knee osteoarthritis : A motion analytic study. The Proceedings of Joint Symposium Symposium on Sports Engineering Symposium on Human Dynamics, 2003, 2003, 63-66.	0.0	0
118	3D1-01 Characteristics of the muscle activity by inducing passive locomotor-like leg motions. The Proceedings of the JSME Symposium on Welfare Engineering, 2006, 2006, 232-233.	0.0	0
119	609 Effect of passive stepping on the wrist flexor H-reflex. The Proceedings of the Bioengineering Conference Annual Meeting of BED/JSME, 2008, 2007.20, 221-222.	0.0	0
120	610 On neural mechanisms of soleus H-reflex modulation during walking in healthy subjects. The Proceedings of the Bioengineering Conference Annual Meeting of BED/JSME, 2008, 2007.20, 223-224.	0.0	0
121	Timing Control Strategy in Baseball Batting. The Brain & Neural Networks, 2017, 24, 124-131.	0.1	0
122	Effects of Occasional and Habitual Wearing of High-Heeled Shoes on Static Balance in Young Women. Frontiers in Sports and Active Living, 2022, 4, 760991.	1.8	0
123	Enhancement of loudness discrimination acuity for self-generated sound is independent of musical experience. PLoS ONE, 2021, 16, e0260859.	2.5	0