Jacob Engelmann

List of Publications by Year
in descending order

51 papers	1,182 citations	394421 19 h-index	395702 33 g-index
52 all docs	52 docs citations	52 times ranked	749 citing authors

#	Article	IF	Citations
1	Motion parallax for object localization in electric fields. Bioinspiration and Biomimetics, 2022, 17, 016003.	2.9	1
2	Linking active sensing and spatial learning in weakly electric fish. Current Opinion in Neurobiology, 2021, 71, 1-10.	4.2	11
3	The Use of Supervised Learning Models in Studying Agonistic Behavior and Communication in Weakly Electric Fish. Frontiers in Behavioral Neuroscience, 2021, 15, 718491.	2.0	3
4	Task-Related Sensorimotor Adjustments Increase the Sensory Range in Electrolocation. Journal of Neuroscience, 2020, 40, 1097-1109.	3.6	9
5	Active Control of Sensing Through Movements in Active Electrolocation. , 2020, , 369-384.		0
6	Spatial learning through active electroreception in Gnathonemus petersii. Animal Behaviour, 2019, 156, 1-10.	1.9	7
7	Social odour activates the hippocampal formation in zebra finches (Taeniopygia guttata). Behavioural Brain Research, 2019, 364, 41-49.	2.2	14
8	Motion parallax in electric sensing. Proceedings of the National Academy of Sciences of the United States of America, 2018, 115, 573-577.	7.1	31
9	Male-mediated species recognition among African weakly electric fishes. Royal Society Open Science, 2018, 5, 170443.	2.4	11
10	Application of reduced sensor movement sequences as a precursor for search area partitioning and a selection of discrete EEV contour-ring fragments for active electrolocation. Bioinspiration and Biomimetics, 2018, 13, 066008.	2.9	5
11	Physiological evidence of sensory integration in the electrosensory lateral line lobe of Gnathonemus petersii. PLoS ONE, 2018, 13, e0194347.	2.5	1
12	Electric pulse characteristics can enable species recognition in African weakly electric fish species. Scientific Reports, 2018, 8, 10799.	3.3	10
13	Sensing External and Self-Motion with Hair Cells: A Comparison of the Lateral Line and Vestibular Systems from a Developmental and Evolutionary Perspective. Brain, Behavior and Evolution, 2017, 90, 98-116.	1.7	53
14	Sensory Flow as a Basis for a Novel Distance Cue in Freely Behaving Electric Fish. Journal of Neuroscience, 2017, 37, 302-312.	3.6	23
15	Sensory Flow as a Basis for a Novel Distance Cue in Freely Behaving Electric Fish. Journal of Neuroscience, 2017, 37, 302-312.	3.6	2
16	Modeling latency code processing in the electric sense: from the biological template to its VLSI implementation. Bioinspiration and Biomimetics, 2016, 11, 055007.	2.9	5
17	Electrolocation of objects in fluids by means of active sensor movements based on discrete EEVs. Bioinspiration and Biomimetics, 2016, 11, 055002.	2.9	4
18	Somatotopic map of the active electrosensory sense in the midbrain of the mormyrid <i>Gnathonemus petersii</i>. Journal of Comparative Neurology, 2016, 524, 2479-2491.	1.6	7

#	Article	IF	Citations
19	Adaptation-induced modification of motion selectivity tuning in visual tectal neurons of adult zebrafish. Journal of Neurophysiology, 2015, 114, 2893-2902.	1.8	8
20	More a finger than a nose: The trigeminal motor and sensory innervation of the <scp>S</scp>chnauzenorgan in the elephantâ€nose Fish <i>Gnathonemus petersii</i>. Journal of Comparative Neurology, 2015, 523, 769-789.	1.6	17
21	Comparative histology of the adult electric organ among four species of the genus Campylomormyrus (Teleostei: Mormyridae). Journal of Comparative Physiology A: Neuroethology, Sensory, Neural, and Behavioral Physiology, 2015, 201, 357-374.	1.6	19
22	Motor patterns during active electrosensory acquisition. Frontiers in Behavioral Neuroscience, 2014, 8, 186.	2.0	25
23	Grouped retinae and tapetal cups in some Teleostian fish: Occurrence, structure, and function. Progress in Retinal and Eye Research, 2014, 38, 43-69.	15.5	31
24	Spatial resolution of an eye containing a grouped retina: ganglion cell morphology and tectal physiology in the weakly electric fishGnathonemus petersii. Journal of Comparative Neurology, 2013, 521, n/a-n/a.	1.6	9
25	Sensory flow shaped by active sensing: sensorimotor strategies in electric fish. Journal of Experimental Biology, 2013, 216, 2487-2500.	1.7	64
26	Editorial. Journal of Physiology (Paris), 2013, 107, 1.	2.1	0
27	From static electric images to electric flow: Towards dynamic perceptual cues in active electroreception. Journal of Physiology (Paris), 2013, 107, 95-106.	2.1	25
28	A grouped retina provides high temporal resolution in the weakly electric fish Gnathonemus petersii. Journal of Physiology (Paris), 2013, 107, 84-94.	2.1	14
29	Monitoring of Single-Cell Responses in the Optic Tectum of Adult Zebrafish with Dextran-Coupled Calcium Dyes Delivered via Local Electroporation. PLoS ONE, 2013, 8, e62846.	2.5	14
30	Photonic Crystal Light Collectors in Fish Retina Improve Vision in Turbid Water. Science, 2012, 336, 1700-1703.	12.6	71
31	Temporal precision and reliability in the velocity regime of a hair-cell sensory system: the mechanosensory lateral line of goldfish, Carassius auratus. Journal of Neurophysiology, 2012, 107, 2581-2593.	1.8	10
32	Coding of Stimuli by Ampullary Afferents in<i>Gnathonemus petersii</i>. Journal of Neurophysiology, 2010, 104, 1955-1968.	1.8	19
33	3-Dimensional scene perception during active electrolocation in a weakly electric pulse fish. Frontiers in Behavioral Neuroscience, 2010, 4, 26.	2.0	53
34	Wake Tracking and the Detection of Vortex Rings by the Canal Lateral Line of Fish. Physical Review Letters, 2009, 103, 078102.	7.8	23
35	Magic trait Electric Organ Discharge (EOD). Communicative and Integrative Biology, 2009, 2, 329-331.	1.4	36
36	The Schnauzenorgan-response of Gnathonemus petersii. Frontiers in Zoology, 2009, 6, 21.	2.0	19

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37	Electrifying love: electric fish use species-specific discharge for mate recognition. Biology Letters, 2009, 5, 225-228.	2.3	82
38	Object localization through the lateral line system of fish: theory and experiment. Journal of Comparative Physiology A: Neuroethology, Sensory, Neural, and Behavioral Physiology, 2008, 194, 1-17.	1.6	97
39	Receptive field properties of neurons in the electrosensory lateral line lobe of the weakly electric fish, Gnathonemus petersii. Journal of Comparative Physiology A: Neuroethology, Sensory, Neural, and Behavioral Physiology, 2008, 194, 1063-1075.	1.6	12
40	Electric imaging through active electrolocation: implication for the analysis of complex scenes. Biological Cybernetics, 2008, 98, 519-539.	1.3	45
41	Functional foveae in an electrosensory system. Journal of Comparative Neurology, 2008, 511, 342-359.	1.6	61
42	Editorial note. Journal of Physiology (Paris), 2008, 102, 153.	2.1	1
43	Active sensing. Communicative and Integrative Biology, 2008, 1, 29-31.	1.4	2
44	Active sensing in a mormyrid fish: electric images and peripheral modifications of the signal carrier give evidence of dual foveation. Journal of Experimental Biology, 2008, 211, 921-934.	1.7	62
45	Etomidate Reduces Initiation of Backpropagating Dendritic Action Potentials: Implications for Sensory Processing and Synaptic Plasticity During Anesthesia. Journal of Neurophysiology, 2007, 97, 2373-2384.	1.8	9
46	Sensory and Motor Effects of Etomidate Anesthesia. Journal of Neurophysiology, 2006, 95, 1231-1243.	1.8	20
47	Neural responses of goldfish lateral line afferents to vortex motions. Journal of Experimental Biology, 2006, 209, 327-342.	1.7	58
48	Wie Fische Wasser fÃ¼hlen: Das Seitenliniensystem. Biologie in Unserer Zeit, 2004, 34, 358-365.	0.2	15
49	Coding of lateral line stimuli in the goldfish midbrain in still and running water. Zoology, 2004, 107, 135-151.	1.2	27
50	Effects of Running Water on Lateral Line Responses to Moving Objects. Brain, Behavior and Evolution, 2003, 61, 195-212.	1.7	29
51	RESPONSES OF PRIMARY AND SECONDARY LATERAL LINE UNITS TO DIPOLE STIMULI APPLIED UNDER STILL AND RUNNING WATER CONDITIONS. Bioacoustics, 2002, 12, 158-160.	1.7	8