Mark A Frye

List of Publications by Year
in descending order

Source: https://exaly.com/author-pdf/8749613/publications.pdf

Version: 2024-02-01

78	3,319	159358	168136
papers	citations	30 h-index	53 g-index

84	84	84	2407
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Free-Flight Odor Tracking in Drosophila Is Consistent with an Optimal Intermittent Scale-Free Search. PLoS ONE, 2007, 2, e354.	1.1	338
2	A Placebo-Controlled Evaluation of Adjunctive Modafinil in the Treatment of Bipolar Depression. American Journal of Psychiatry, 2007, 164, 1242-1249.	4.0	224
3	Spatial organization of visuomotor reflexes in Drosophila. Journal of Experimental Biology, 2004, 207, 113-122.	0.8	151
4	Visual Input to the Drosophila Central Complex by Developmentally and Functionally Distinct Neuronal Populations. Current Biology, 2017, 27, 1098-1110.	1.8	149
5	Flies Require Bilateral Sensory Input to Track Odor Gradients in Flight. Current Biology, 2009, 19, 1301-1307.	1.8	133
6	Bipolar disorder and comorbid alcoholism: prevalence rate and treatment considerations. Bipolar Disorders, 2006, 8, 677-685.	1.1	122
7	Odor localization requires visual feedback during free flight inDrosophila melanogaster. Journal of Experimental Biology, 2003, 206, 843-855.	0.8	109
8	Object-Detecting Neurons in Drosophila. Current Biology, 2017, 27, 680-687.	1.8	105
9	Flies see second-order motion. Current Biology, 2008, 18, R464-R465.	1.8	91
10	Molecular dynamics of cyclically contracting insect flight muscle in vivo. Nature, 2005, 433, 330-334.	13.7	85
11	Motor output reflects the linear superposition of visual and olfactory inputs in Drosophila. Journal of Experimental Biology, 2004, 207, 123-131.	0.8	83
12	Fly Flight. Neuron, 2001, 32, 385-388.	3.8	75
13	A visual pathway for skylight polarization processing in Drosophila. ELife, 2021, 10, .	2.8	72
14	Peripheral Visual Circuits Functionally Segregate Motion and Phototaxis Behaviors in the Fly. Current Biology, 2009, 19, 613-619.	1.8	66
15	Dynamics of optomotor responses in Drosophila to perturbations in optic flow. Journal of Experimental Biology, 2010, 213, 1366-1375.	0.8	66
16	Neurons Forming Optic Glomeruli Compute Figureâ€“Ground Discriminations inDrosophila. Journal of Neuroscience, 2015, 35, 7587-7599.	1.7	64
17	FigureÂTracking by Flies Is Supported by Parallel Visual Streams. Current Biology, 2012, 22, 482-487.	1.8	61
18	Drosophila Tracks Carbon Dioxide in Flight. Current Biology, 2013, 23, 301-306.	1.8	60

#	Article	IF	Citations
19	Sensory response patterns and the evolution of visual signal design in anoline lizards. Journal of Comparative Physiology A: Neuroethology, Sensory, Neural, and Behavioral Physiology, 1999, 184, 585-607.	0.7	58
20	Crossmodal Visual Input for Odor Tracking during Fly Flight. Current Biology, 2008, 18, 270-275.	1.8	58
21	Context-dependent olfactory enhancement of optomotor flight control inDrosophila. Journal of Experimental Biology, 2008, 211, 2478-2485.	0.8	56
22	Cell-type-Specific Patterned Stimulus-Independent Neuronal Activity in the Drosophila Visual System during Synapse Formation. Neuron, 2019, 101, 894-904.e5.	3.8	55
23	The spatial, temporal and contrast properties of expansion and rotation flight optomotor responses inDrosophila. Journal of Experimental Biology, 2007, 210, 3218-3227.	0.8	52
24	Mechanisms of odor-tracking: multiple sensors for enhanced perception and behavior. Frontiers in Cellular Neuroscience, 2010, 4, 6.	1.8	52
25	Olfactory Neuromodulation of Motion Vision Circuitry in Drosophila. Current Biology, 2015, 25, 467-472.	1.8	52
26	Drosophila Spatiotemporally Integrates Visual Signals to Control Saccades. Current Biology, 2017, 27, 2901-2914.e2.	1.8	49
27	Closing the loop between neurobiology and flight behavior in Drosophila. Current Opinion in Neurobiology, 2004, 14, 729-736.	2.0	48
28	Mutation of theDrosophilavesicular GABA transporter disrupts visual figure detection. Journal of Experimental Biology, 2010, 213, 1717-1730.	0.8	48
29	Visual receptive field properties of feature detecting neurons in the dragonfly. Journal of Comparative Physiology A: Neuroethology, Sensory, Neural, and Behavioral Physiology, 1995, 177, 569.	0.7	40
30	Figure-ground discrimination behavior in Drosophila. II. Visual influences on head movement. Journal of Experimental Biology, 2014, 217, 570-9.	0.8	38
31	Inhibitory Interactions and Columnar Inputs to an Object Motion Detector in Drosophila. Cell Reports, 2020, 30, 2115-2124.e5.	2.9	37
32	Non-canonical Receptive Field Properties and Neuromodulation of Feature-Detecting Neurons in Flies. Current Biology, 2020, 30, 2508-2519.e6.	1.8	36
33	An Olfactory Circuit Increases the Fidelity of Visual Behavior. Journal of Neuroscience, 2011, 31, 15035-15047.	1.7	35
34	Dynamic properties of large-field and small-field optomotor flight responses in Drosophila. Journal of Comparative Physiology A: Neuroethology, Sensory, Neural, and Behavioral Physiology, 2007, 193, 787-799.	0.7	34
35	Binocular interactions underlying the classic optomotor responses of flying flies. Frontiers in Behavioral Neuroscience, 2012, 6, 6.	1.0	33
36	Figure-ground discrimination behavior in Drosophila. I. Spatial organization of wing steering responses. Journal of Experimental Biology, 2014, 217, 558-69.	0.8	32

#	Article	IF	Citations
37	Olfactory and Neuromodulatory Signals Reverse Visual Object Avoidance to Approach in Drosophila. Current Biology, 2019, 29, 2058-2065.e2.	1.8	32
38	Neuromodulation of insect motion vision. Journal of Comparative Physiology A: Neuroethology, Sensory, Neural, and Behavioral Physiology, 2020, 206, 125-137.	0.7	28
39	Multisensory systems integration for high-performance motor control in flies. Current Opinion in Neurobiology, 2010, 20, 347-352.	2.0	27
40	Effects of stretch receptor ablation on the optomotor control of lift in the hawkmothManduca sexta. Journal of Experimental Biology, 2001, 204, 3683-3691.	0.8	27
41	The neuro-ecology of resource localization in Drosophila: Behavioral components of perception and search. Fly, 2009, 3, 50-61.	0.9	26
42	Invertebrate solutions for sensing gravity. Current Biology, 2009, 19, R186-R190.	1.8	25
43	Multisensory integration for odor tracking by flyingDrosophila. Communicative and Integrative Biology, 2010, 3, 60-63.	0.6	23
44	Flies dynamically anti-track, rather than ballistically escape, aversive odor during flight. Journal of Experimental Biology, 2012, 215, 2833-2840.	0.8	23
45	A Magnetic Tether System to Investigate Visual and Olfactory Mediated Flight Control in Drosophila. Journal of Visualized Experiments, 2008, , .	0.2	22
46	Theta motion processing in fruit flies. Frontiers in Behavioral Neuroscience, 2010, 4, .	1.0	19
47	Odor identity influences tracking of temporally patterned plumes in Drosophila. BMC Neuroscience, 2011, 12, 62.	0.8	18
48	Encoding properties of the wing hinge stretch receptor in the hawkmothManduca sexta. Journal of Experimental Biology, 2001, 204, 3693-3702.	0.8	18
49	Visual Edge Orientation Shapes Free-Flight Behavior in Drosophila. Fly, 2007, 1, 153-154.	0.9	14
50	Higher-Order FigureÂDiscrimination in Fly and Human Vision. Current Biology, 2013, 23, R694-R700.	1.8	14
51	Visuomotor strategies for object approach and aversion in Drosophila melanogaster. Journal of Experimental Biology, 2019, 222, .	0.8	14
52	Method and software for using m-sequences to characterize parallel components of higher-order visual tracking behavior in Drosophila. Frontiers in Neural Circuits, 2014, 8, 130.	1.4	13
53	Serotonergic modulation of visual neurons in Drosophila melanogaster. PLoS Genetics, 2020, 16, e1009003.	1.5	13
54	Behavioral Neurobiology: AÂVibrating Gyroscope Controls Fly Steering Maneuvers. Current Biology, 2007, 17, R134-R136.	1.8	11

#	Article	IF	Citations
55	Elementary motion detectors. Current Biology, 2015, 25, R215-R217.	1.8	11
56	Object features and T4/T5 motion detectors modulate the dynamics of bar tracking byDrosophila. Journal of Experimental Biology, 2019, 222, .	0.8	10
57	Fly eyes are not still: a motion illusion in Drosophila flight supports parallel visual processing. Journal of Experimental Biology, 2020, 223, .	0.8	10
58	Visual stabilization dynamics are enhanced by standing flight velocity. Biology Letters, 2010, 6, 410-413.	1.0	8
59	The eyes have it. ELife, 2017, 6, .	2.8	8
60	Odour boosts visual object approach in flies. Biology Letters, 2021, 17, 20200770.	1.0	6
61	Visually Mediated Odor Tracking During Flight in Drosophila. Journal of Visualized Experiments, 2009, , .	0.2	5
62	Visual Attention: A Cell that Focuses on One Object at a Time. Current Biology, 2013, 23, R61-R63.	1.8	4
63	Flies Require Bilateral Sensory Input to Track Odor Gradients in Flight. Current Biology, 2009, 19, 1774-1775.	1.8	3
64	Neurobiology: Fly Gyro-Vision. Current Biology, 2009, 19, R1119-R1121.	1.8	3
65	A signature of salience in the Drosophila brain. Nature Neuroscience, 2003, 6, 544-546.	7.1	2
66	Mechanosensory Integration for Flight Control in Insects. Frontiers in Neuroscience, 2004, , .	0.0	2
67	Animal Behavior: Fly Flight Moves Forward. Current Biology, 2013, 23, R278-R279.	1.8	2
68	Animal Behavior: Flying Back to Front. Current Biology, 2008, 18, R169-R170.	1.8	1
69	Neurogenetics and the "fly-stampede": dissecting neural circuits involved in visual behaviors. Fly, 2009, 3, 209-211.	0.9	1
70	Group Behavior: Social Context Modulates Behavioral Responses to Sensory Stimuli. Current Biology, 2015, 25, R467-R469.	1.8	1
71	Cell-Type Specific Patterned Stimulus-Independent Neuronal Activity in the Drosophila Visual System During Synapse Formation. SSRN Electronic Journal, 0, , .	0.4	1
72	MEMS-enabled multi-unit neural recording from Drosophila melanogaster. , 2011, , .		0

#	Article	IF	Citations
73	Insect Vision: A Neuron that Anticipates an Objectâ€™s Path. Current Biology, 2017, 27, R1076-R1078.	1.8	0
74	Drosophila Neuroscience: Should I Land or ShouldÂI Jump?. Current Biology, 2019, 29, R1089-R1091.	1.8	0
75	Serotonergic modulation of visual neurons in Drosophila melanogaster. , 2020, 16, e1009003.		0
76	Serotonergic modulation of visual neurons in Drosophila melanogaster. , 2020, 16, e1009003.		0
77	Serotonergic modulation of visual neurons in Drosophila melanogaster. , 2020, 16, e1009003.		0
78	Serotonergic modulation of visual neurons in Drosophila melanogaster. , 2020, 16, e1009003.		0