Akihiko Ishijima

List of Publications by Year
in descending order

41 papers	3,593 citations	218592 26 h-index	289141 40 g-index
41 all docs	41 docs citations	41 times ranked	2371 citing authors

#	Article	IF	Citations
1	Local heating of molecular motors using single carbon nanotubes. Biophysical Reviews, 2016, 8, 25-32.	1.5	2
2	Single Carbon Nanotube-Based Reversible Regulation of Biological Motor Activity. ACS Nano, 2015, 9, 3677-3684.	7.3	7
3	Hybrid-fuel bacterial flagellar motors in<i>Escherichia coli</i>. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 3436-3441.	3.3	28
4	Direct Imaging of Intracellular Signaling Components That Regulate Bacterial Chemotaxis. Science Signaling, 2014, 7, ra32.	1.6	35
5	Micrometer-Size Vesicle Formation Triggered by UV Light. Langmuir, 2014, 30, 7289-7295.	1.6	21
6	Single-Cell E.Âcoli Response to an Instantaneously Applied Chemotactic Signal. Biophysical Journal, 2014, 107, 730-739.	0.2	28
7	Temperature Changes in Brown Adipocytes Detected with a Bimaterial Microcantilever. Biophysical Journal, 2014, 106, 2458-2464.	0.2	37
8	Temperature Dependences of Torque Generation and Membrane Voltage in the Bacterial Flagellar Motor. Biophysical Journal, 2013, 105, 2801-2810.	0.2	5
9	High Hydrostatic Pressure Induces Counterclockwise to Clockwise Reversals of the Escherichia coli Flagellar Motor. Journal of Bacteriology, 2013, 195, 1809-1814.	1.0	39
10	Pico calorimeter for detection of heat produced in an individual brown fat cell. Applied Physics Letters, 2012, 100, .	1.5	78
11	Velocity-Dependent Actomyosin ATPase Cycle Revealed by InÂVitro Motility Assay with Kinetic Analysis. Biophysical Journal, 2012, 103, 711-718.	0.2	7
12	Coordinated Reversal of Flagellar Motors on a Single Escherichia coli Cell. Biophysical Journal, 2011, 100, 2193-2200.	0.2	43
13	Two methods of temperature control for single-molecule measurements. European Biophysics Journal, 2011, 40, 651-660.	1.2	17
14	Thermosensing Function of the<i>Escherichia coli</i>Redox Sensor Aer. Journal of Bacteriology, 2010, 192, 1740-1743.	1.0	16
15	Exchange of rotor components in functioning bacterial flagellar motor. Biochemical and Biophysical Research Communications, 2010, 394, 130-135.	1.0	55
16	Sodiumâ€dependent dynamic assembly of membrane complexes in sodiumâ€driven flagellar motors. Molecular Microbiology, 2009, 71, 825-835.	1.2	133
17	Formation and maintenance of tubular membrane projections: Experiments and numerical calculations. BioSystems, 2008, 93, 115-119.	0.9	5
18	Torqueâ€"Speed Relationships of Na+-driven Chimeric Flagellar Motors in Escherichia coli. Journal of Molecular Biology, 2008, 376, 1251-1259.	2.0	76

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19	Visualization of Functional Rotor Proteins of the Bacterial Flagellar Motor in the Cell Membrane. Journal of Molecular Biology, 2007, 367, 692-701.	2.0	35
20	Direct observation of steps in rotation of the bacterial flagellar motor. Nature, 2005, 437, 916-919.	13.7	309
21	Formation and Maintenance of Tubular Membrane Projections Require Mechanical Force, but their Elongation and Shortening do not Require Additional Force. Journal of Molecular Biology, 2005, 348, 325-333.	2.0	42
22	The Neck Domain of Myosin II Primarily Regulates the Actomyosin Kinetics, not the Stepsize. Journal of Molecular Biology, 2005, 353, 213-221.	2.0	5
23	Mechanical analyses of morphological and topological transformation of liposomes. BioSystems, 2003, 71, 93-100.	0.9	42
24	Torqueâ€"speed Relationship of the Na+-driven Flagellar Motor of Vibrio alginolyticus. Journal of Molecular Biology, 2003, 327, 1043-1051.	2.0	130
25	A Kinetic Mechanism for the Fast Movement of Chara Myosin. Journal of Molecular Biology, 2003, 328, 939-950.	2.0	46
26	The Systematic Substitutions Around the Conserved Charged Residues of the Cytoplasmic Loop of Na+-driven Flagellar Motor Component PomA. Journal of Molecular Biology, 2002, 320, 403-413.	2.0	60
27	Morphological and topological transformation of membrane vesicles. Journal of Biological Physics, 2002, 28, 225-235.	0.7	8
28	Single molecule nanomanipulation of biomolecules. Trends in Biotechnology, 2001, 19, 211-216.	4.9	63
29	Single molecule nanobioscience. Trends in Biochemical Sciences, 2001, 26, 438-444.	3.7	180
30	Simultaneous Measurement of Individual ATPase and Mechanical Reactions by a Single Myosin Molecule at Work. Optical Review, 1999, 6, 16-23.	1.2	1
31	Simultaneous Observation of Individual ATPase and Mechanical Events by a Single Myosin Molecule during Interaction with Actin. Cell, 1998, 92, 161-171.	13.5	494
32	Orientation Dependence of Displacements by a Single One-Headed Myosin Relative to the Actin Filament. Biophysical Journal, 1998, 75, 1886-1894.	0.2	115
33	Multiple- and single-molecule analysis of the actomyosin motor by nanometer-piconewton manipulation with a microneedle: unitary steps and forces. Biophysical Journal, 1996, 70, 383-400.	0.2	229
34	Modification of the bi-directional sliding movement of actin filaments along native thick filaments isolated from a clam. Journal of Muscle Research and Cell Motility, 1996, 17, 637-646.	0.9	10
35	Single-Molecule Analysis of the Actomyosin Motor Using Nano-Manipulation. Biochemical and Biophysical Research Communications, 1994, 199, 1057-1063.	1.0	210
36	Direct measurement of stiffness of single actin filaments with and without tropomyosin by in vitro nanomanipulation.. Proceedings of the National Academy of Sciences of the United States of America, 1994, 91, 12962-12966.	3.3	451

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37	Force-Generating Domain of Myosin Motor. Biochemical and Biophysical Research Communications, 1993, 196, 1504-1510.	1.0	115
38	Nano-manipulation of actomyosin molecular motors in vitro: a new working principle. Trends in Biochemical Sciences, 1993, 18, 319-324.	3.7	47
39	Charge-reversion mutagenesis of Dictyostelium actin to map the surface recognized by myosin during ATP-driven sliding motion.. Proceedings of the National Academy of Sciences of the United States of America, 1993, 90, 2127-2131.	3.3	83
40	Sub-piconewton force fluctuations of actomyosin in vitro. Nature, 1991, 352, 301-306.	13.7	277
41	Accumulated strain mechanism for length determination of thick filaments in skeletal muscle. I. Experimental bases. Journal of Muscle Research and Cell Motility, 1986, 7, 491-500.	0.9	9