

# Making sense of it all: bacterial chemotaxis

Nature Reviews Molecular Cell Biology

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Citation Report

#	ARTICLE	IF	CITATIONS
1	Requirements for chemotaxis protein localization in <i>Rhodobacter sphaeroides</i> . <i>Molecular Microbiology</i> , 2005, 58, 895-902.	1.2	34
3	Design principles of a bacterial signalling network. <i>Nature</i> , 2005, 438, 504-507.	13.7	260
4	CheX Is a Phosphorylated CheY Phosphatase Essential for <i>Borrelia burgdorferi</i> Chemotaxis. <i>Journal of Bacteriology</i> , 2005, 187, 7963-7969.	1.0	59
5	Phosphate flow in the chemotactic response system of <i>Helicobacter pylori</i> . <i>Microbiology (United Kingdom)</i> 155: 107-114. doi:10.1093/mic/duq114	0.7	55
6	Link between Chemotactic Response to Ni <sup>2+</sup> and its Adsorption onto the <i>Escherichia coli</i> Cell Surface. <i>Environmental Science &amp; Technology</i> , 2005, 39, 5227-5233.	4.6	27
7	Making waves: pattern formation by a cell-surface-associated signal. <i>Trends in Microbiology</i> , 2005, 13, 249-252.	3.5	20
8	Going against the grain: chemotaxis and infection in <i>Vibrio cholerae</i> . <i>Nature Reviews Microbiology</i> , 2005, 3, 611-620.	13.6	297
9	Stimulus Perception in Bacterial Signal-Transducing Histidine Kinases. <i>Microbiology and Molecular Biology Reviews</i> , 2006, 70, 910-938.	2.9	592
10	Structural Basis for O <sub>2</sub> Sensing by the Hemerythrin-like Domain of a Bacterial Chemotaxis Protein: A Substrate Tunnel and Fluxional N Terminus. <i>Biochemistry</i> , 2006, 45, 9023-9031.	1.2	55
11	Reconciling the "old" and "new" views of protein allostery: A molecular simulation study of chemotaxis Y protein (CheY). <i>Proteins: Structure, Function and Bioinformatics</i> , 2006, 63, 846-867.	1.5	103
12	Microbial cell individuality and the underlying sources of heterogeneity. <i>Nature Reviews Microbiology</i> , 2006, 4, 577-587.	13.6	460
13	Crystal Structures of Beryllium Fluoride-free and Beryllium Fluoride-bound CheY in Complex with the Conserved C-terminal Peptide of CheZ Reveal Dual Binding Modes Specific to CheY Conformation. <i>Journal of Molecular Biology</i> , 2006, 359, 624-645.	2.0	45
14	CheA Kinase of Bacterial Chemotaxis: Chemical Mapping of Four Essential Docking Sites. <i>Biochemistry</i> , 2006, 45, 8699-8711.	1.2	50
15	A Receptor-Modifying Deamidase in Complex with a Signaling Phosphatase Reveals Reciprocal Regulation. <i>Cell</i> , 2006, 124, 561-571.	13.5	64
16	Systems biology of bacterial chemotaxis. <i>Current Opinion in Microbiology</i> , 2006, 9, 187-192.	2.3	61
17	Spatial organization of the bacterial chemotaxis system. <i>Current Opinion in Microbiology</i> , 2006, 9, 619-624.	2.3	90
18	Comparison of aerobic and photosynthetic <i>Rhodobacter sphaeroides</i> 2.4.1 proteomes. <i>Journal of Microbiological Methods</i> , 2006, 67, 424-436.	0.7	39
19	Roles of flagella in pathogenic bacteria and bacterial-host interactions. <i>Journal of Bacteriology</i> , 2006, 188, 131-157.	0	0

#	ARTICLE	IF	CITATIONS
20	12 Reversible methylation of glutamate residues in the receptor proteins of bacterial sensory systems. <i>The Enzymes</i> , 2006, 24, 325-382.	0.7	9
21	Characterization of ac-type heme-containing PAS sensor domain from <i>Geobacter sulfurreducens</i> representing a novel family of periplasmic sensors in <i>Geobacteraceae</i> and other bacteria. <i>FEMS Microbiology Letters</i> , 2006, 258, 173-181.	0.7	26
22	Minimal requirements for oxygen sensing by the aerotaxis receptor Aer. <i>Molecular Microbiology</i> , 2006, 59, 1317-1326.	1.2	23
23	Cholera stool bacteria repress chemotaxis to increase infectivity. <i>Molecular Microbiology</i> , 2006, 60, 417-426.	1.2	75
24	Functional studies of the Ssk1p response regulator protein of <i>Candida albicans</i> as determined by phenotypic analysis of receiver domain point mutants. <i>Molecular Microbiology</i> , 2006, 62, 997-1013.	1.2	33
25	Reconstruction of the chemotaxis receptor kinase assembly. <i>Nature Structural and Molecular Biology</i> , 2006, 13, 400-407.	3.6	257
26	Signal transduction in bacterial chemotaxis. <i>BioEssays</i> , 2006, 28, 9-22.	1.2	286
27	The use of a generalized born model for the analysis of protein conformational transitions: A comparative study with explicit solvent simulations for chemotaxis Y protein (CheY). <i>Journal of Computational Chemistry</i> , 2006, 27, 1923-1943.	1.5	15
28	Genetic Transplantation: <i>Salmonella enterica</i> Serovar Typhimurium as a Host To Study Sigma Factor and Anti-Sigma Factor Interactions in Genetically Intractable Systems. <i>Journal of Bacteriology</i> , 2006, 188, 103-114.	1.0	27
29	The Genome of Deep-Sea Vent Chemolithoautotroph <i>Thiomicrospira crunogena</i> XCL-2. <i>PLoS Biology</i> , 2006, 4, e383.	2.6	144
30	Changing Cellular Location of CheZ Predicted by Molecular Simulations. <i>PLoS Computational Biology</i> , 2006, 2, e39.	1.5	47
31	Cysteine-Scanning Analysis of the Chemoreceptor-Coupling Domain of the <i>Escherichia coli</i> Chemotaxis Signaling Kinase CheA. <i>Journal of Bacteriology</i> , 2006, 188, 4321-4330.	1.0	23
32	Mutational Analysis of the Chemoreceptor-Coupling Domain of the <i>Escherichia coli</i> Chemotaxis Signaling Kinase CheA. <i>Journal of Bacteriology</i> , 2006, 188, 3299-3307.	1.0	30
33	Cooperativity Between Different Nutrient Receptors in Germination of Spores of <i>Bacillus subtilis</i> and Reduction of This Cooperativity by Alterations in the GerB Receptor. <i>Journal of Bacteriology</i> , 2006, 188, 28-36.	1.0	126
34	Self-assembly of receptor/signaling complexes in bacterial chemotaxis. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2006, 103, 14313-14318.	3.3	24
35	Identification of Methylation Sites in <i>Thermotoga maritima</i> Chemotaxis Receptors. <i>Journal of Bacteriology</i> , 2006, 188, 4093-4100.	1.0	20
36	Differential Recognition of Citrate and a Metal-Citrate Complex by the Bacterial Chemoreceptor Tcp. <i>Journal of Biological Chemistry</i> , 2006, 281, 17727-17735.	1.6	18
37	Guanylyl Cyclase Protein and cGMP Product Independently Control Front and Back of Chemotaxing <i>Dictyostelium</i> Cells. <i>Molecular Biology of the Cell</i> , 2006, 17, 3921-3929.	0.9	44

#	ARTICLE	IF	CITATIONS
38	The positioning of cytoplasmic protein clusters in bacteria. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 8209-8214.	3.3	97
39	Nanodiscs separate chemoreceptor oligomeric states and reveal their signaling properties. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 11509-11514.	3.3	181
40	Shape and oligomerization state of the cytoplasmic domain of the phototaxis transducer II from <i>Natronobacterium pharaonis</i> . Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 15428-15433.	3.3	10
41	Two Chemosensory Operons of <i>Rhodobacter sphaeroides</i> Are Regulated Independently by Sigma 28 and Sigma 54. <i>Journal of Bacteriology</i> , 2006, 188, 7932-7940.	1.0	17
42	Role of CheB and CheR in the Complex Chemotactic and Aerotactic Pathway of <i>Azospirillum brasilense</i> . <i>Journal of Bacteriology</i> , 2006, 188, 4759-4768.	1.0	41
43	The CheYs of <i>Rhodobacter sphaeroides</i> . <i>Journal of Biological Chemistry</i> , 2006, 281, 32694-32704.	1.6	48
44	Structure of FlIM provides insight into assembly of the switch complex in the bacterial flagella motor. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 11886-11891.	3.3	101
45	Uropathogenic <i>Escherichia coli</i> Strains Generally Lack Functional Trg and Tap Chemoreceptors Found in the Majority of <i>E. coli</i> Strains Strictly Residing in the Gut. <i>Journal of Bacteriology</i> , 2006, 188, 5618-5625.	1.0	24
46	Identification of Specific Chemoattractants and Genetic Complementation of a <i>Borrelia burgdorferi</i> Chemotaxis Mutant: Flow Cytometry-Based Capillary Tube Chemotaxis Assay. <i>Applied and Environmental Microbiology</i> , 2007, 73, 1180-1188.	1.4	50
47	Direct visualization of <i>Escherichia coli</i> chemotaxis receptor arrays using cryo-electron microscopy. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 3777-3781.	3.3	176
48	Mechanisms of Gradient Detection: A Comparison of Axon Pathfinding with Eukaryotic Cell Migration. <i>International Review of Cytology</i> , 2007, 263, 1-62.	6.2	55
49	Evolutionary genomics reveals conserved structural determinants of signaling and adaptation in microbial chemoreceptors. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 2885-2890.	3.3	235
50	A Comprehensive Genetic Characterization of Bacterial Motility. <i>PLoS Genetics</i> , 2007, 3, e154.	1.5	203
51	Robustness analysis of the <i>E. coli</i> chemosensory system to perturbations in chemoattractant concentrations. <i>Bioinformatics</i> , 2007, 23, 875-881.	1.8	8
53	Algorithms for Discriminating Between Biochemical Reaction Network Models: Towards Systematic Experimental Design. Proceedings of the American Control Conference, 2007, , .	0.0	8
54	Circuit Motifs for Spatial Orientation Behaviors Identified by Neural Network Optimization. <i>Journal of Neurophysiology</i> , 2007, 98, 888-897.	0.9	11
55	Phenotypic Suppression Methods for Analyzing Intra- and Inter-Molecular Signaling Interactions of Chemoreceptors. <i>Methods in Enzymology</i> , 2007, 423, 436-457.	0.4	9
56	Postgenomic Adventures with <i>Rhodobacter sphaeroides</i> . <i>Annual Review of Microbiology</i> , 2007, 61, 283-307.	2.9	74

#	ARTICLE	IF	CITATIONS
57	The voltage-gated Na <sup>+</sup> channel NaVBP co-localizes with methyl-accepting chemotaxis protein at cell poles of alkaliphilic <i>Bacillus pseudofirmus</i> OF4. <i>Microbiology (United Kingdom)</i> , 2007, 153, 4027-4038.	0.7	26
58	Motility and Chemotaxis in <i>Agrobacterium tumefaciens</i> Surface Attachment and Biofilm Formation. <i>Journal of Bacteriology</i> , 2007, 189, 8005-8014.	1.0	176
59	On Torque and Tumbling in Swimming <i>Escherichia coli</i> . <i>Journal of Bacteriology</i> , 2007, 189, 1756-1764.	1.0	382
60	How 34 Pegs Fit into 26 + 8 Holes in the Flagellar Motor. <i>Journal of Bacteriology</i> , 2007, 189, 291-293.	1.0	8
61	Solution structure of the bacterial chemotaxis adaptor protein CheW from <i>Escherichia coli</i> . <i>Biochemical and Biophysical Research Communications</i> , 2007, 360, 863-867.	1.0	26
62	Crystal structure of scaffolding protein CheW from <i>thermoanaerobacter tengcongensis</i> . <i>Biochemical and Biophysical Research Communications</i> , 2007, 361, 1027-1032.	1.0	8
63	Co-expression of signaling proteins improves robustness of the bacterial chemotaxis pathway. <i>Journal of Biotechnology</i> , 2007, 129, 173-180.	1.9	26
64	Comparative Genomic and Protein Sequence Analyses of a Complex System Controlling Bacterial Chemotaxis. <i>Methods in Enzymology</i> , 2007, 422, 3-31.	0.4	110
65	Domain Orientation in the Inactive Response Regulator <i>Mycobacterium tuberculosis</i> MtrA Provides a Barrier to Activation. <i>Biochemistry</i> , 2007, 46, 6733-6743.	1.2	76
66	Phosphorylation Assays of Chemotaxis Two-Component System Proteins in <i>Borrelia burgdorferi</i> . <i>Methods in Enzymology</i> , 2007, 422, 438-447.	0.4	3
67	A hydrogel-based microfluidic device for the studies of directed cell migration. <i>Lab on A Chip</i> , 2007, 7, 763.	3.1	305
68	Insights into Correlated Motions and Long-Range Interactions in CheY Derived from Molecular Dynamics Simulations. <i>Biophysical Journal</i> , 2007, 92, 2062-2079.	0.2	33
69	Biased Random Walk by Stochastic Fluctuations of Chemoattractant-Receptor Interactions at the Lower Limit of Detection. <i>Biophysical Journal</i> , 2007, 93, 1787-1796.	0.2	101
70	In Vivo Measurement by FRET of Pathway Activity in Bacterial Chemotaxis. <i>Methods in Enzymology</i> , 2007, 423, 365-391.	0.4	111
71	Guiding Bacteria with Small Molecules and RNA. <i>Journal of the American Chemical Society</i> , 2007, 129, 6807-6811.	6.6	149
72	Correlating single cell motility with population growth dynamics for flagellated bacteria. <i>Biotechnology and Bioengineering</i> , 2007, 97, 1644-1649.	1.7	7
73	<i>Campylobacter jejuni</i> : molecular biology and pathogenesis. <i>Nature Reviews Microbiology</i> , 2007, 5, 665-679.	13.6	662
74	Chemosensory pathways, motility and development in <i>Myxococcus xanthus</i> . <i>Nature Reviews Microbiology</i> , 2007, 5, 862-872.	13.6	251

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75	Positioning of chemosensory clusters in <i>E. coli</i> and its relation to cell division. <i>EMBO Journal</i> , 2007, 26, 1615-1623.	3.5	94
76	The major chemotaxis gene cluster of <i>Rhizobium leguminosarum</i> bv. <i>viciae</i> is essential for competitive nodulation. <i>Molecular Microbiology</i> , 2007, 63, 348-362.	1.2	106
77	Characterization of the <i>Thermotoga maritima</i> chemotaxis methylation system that lacks pentapeptide-dependent methyltransferase CheR: MCP tethering. <i>Molecular Microbiology</i> , 2007, 63, 363-378.	1.2	18
78	The bidirectional polar and unidirectional lateral flagellar motors of <i>Vibrio alginolyticus</i> are controlled by a single CheY species. <i>Molecular Microbiology</i> , 2007, 64, 57-67.	1.2	52
79	Aer on the inside looking out: paradigm for a PAS/HAMP role in sensing oxygen, redox and energy. <i>Molecular Microbiology</i> , 2007, 65, 1415-1424.	1.2	90
80	The Chemotactic Behavior of Computer-Based Surrogate Bacteria. <i>Current Biology</i> , 2007, 17, 12-19.	1.8	85
81	The elusive engine in <i>Myxococcus xanthus</i> gliding motility. <i>Cellular and Molecular Life Sciences</i> , 2007, 64, 2733-2745.	2.4	46
82	Size doesn't matter: towards a more inclusive philosophy of biology. <i>Biology and Philosophy</i> , 2007, 22, 155-191.	0.7	127
83	"Extremotaxis": Computing with a bacterial-inspired algorithm. <i>BioSystems</i> , 2008, 94, 47-54.	0.9	4
84	Overview of Mathematical Approaches Used to Model Bacterial Chemotaxis I: The Single Cell. <i>Bulletin of Mathematical Biology</i> , 2008, 70, 1525-1569.	0.9	96
85	Overview of Mathematical Approaches Used to Model Bacterial Chemotaxis II: Bacterial Populations. <i>Bulletin of Mathematical Biology</i> , 2008, 70, 1570-1607.	0.9	211
86	Engineering motility as a phenotypic response to LuxI/R-dependent quorum sensing in <i>Escherichia coli</i> . <i>Biotechnology and Bioengineering</i> , 2008, 100, 1251-1255.	1.7	27
87	Structural Basis of the Signal Transduction in the Two-Component System. <i>Advances in Experimental Medicine and Biology</i> , 2008, 631, 22-39.	0.8	22
88	Functional metagenomic profiling of nine biomes. <i>Nature</i> , 2008, 452, 629-632.	13.7	842
89	Bilateral olfactory sensory input enhances chemotaxis behavior. <i>Nature Neuroscience</i> , 2008, 11, 187-199.	7.1	167
90	The biology and future prospects of antivirulence therapies. <i>Nature Reviews Microbiology</i> , 2008, 6, 17-27.	13.6	697
91	Motility allows <i>S. Typhimurium</i> to benefit from the mucosal defence. <i>Cellular Microbiology</i> , 2008, 10, 1166-1180.	1.1	174
92	Stochastic assembly of chemoreceptor clusters in <i>Escherichia coli</i> . <i>Molecular Microbiology</i> , 2008, 68, 1228-1236.	1.2	60

#	ARTICLE	IF	CITATIONS
93	A phylogenomic profile of hemerythrins, the nonheme diiron binding respiratory proteins. <i>BMC Evolutionary Biology</i> , 2008, 8, 244.	3.2	47
94	Comparative genomics of <i>Geobacter chemotaxis</i> genes reveals diverse signaling function. <i>BMC Genomics</i> , 2008, 9, 471.	1.2	38
95	Bacterial chemoreceptors: high-performance signaling in networked arrays. <i>Trends in Biochemical Sciences</i> , 2008, 33, 9-19.	3.7	571
96	Bacterial flagellar motor. <i>Quarterly Reviews of Biophysics</i> , 2008, 41, 103-132.	2.4	420
97	Reversing cells and oscillating motility proteins. <i>Molecular BioSystems</i> , 2008, 4, 1009.	2.9	23
98	A Predatory Patchwork: Membrane and Surface Structures of <i>Bdellovibrio bacteriovorus</i> . <i>Advances in Microbial Physiology</i> , 2008, 54, 313-361.	1.0	30
99	Structures and Solution Properties of Two Novel Periplasmic Sensor Domains with c-Type Heme from Chemotaxis Proteins of <i>Geobacter sulfurreducens</i> : Implications for Signal Transduction. <i>Journal of Molecular Biology</i> , 2008, 377, 1498-1517.	2.0	54
100	Physiological Sites of Deamidation and Methyl Esterification in Sensory Transducers of <i>Halobacterium salinarum</i> . <i>Journal of Molecular Biology</i> , 2008, 380, 285-302.	2.0	17
101	<i>Rhodobacter sphaeroides</i> : complexity in chemotactic signalling. <i>Trends in Microbiology</i> , 2008, 16, 251-260.	3.5	85
102	Expression and characterization of the integral membrane domain of bacterial histidine kinase SCO3062 for structural studies. <i>Biochemical and Biophysical Research Communications</i> , 2008, 376, 409-413.	1.0	7
103	The thermal impulse response of <i>Escherichia coli</i> . <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2008, 105, 5373-5377.	3.3	73
104	The Tie That Binds the Dynamic Duo: the Connector between AS1 and AS2 in the HAMP Domain of the <i>Escherichia coli</i> Tsr Chemoreceptor. <i>Journal of Bacteriology</i> , 2008, 190, 6544-6547.	1.0	8
105	Kinetic Characterization of Catalysis by the Chemotaxis Phosphatase CheZ. <i>Journal of Biological Chemistry</i> , 2008, 283, 756-765.	1.6	35
106	Chemoreceptors in <i>Caulobacter crescentus</i> : Trimers of Receptor Dimers in a Partially Ordered Hexagonally Packed Array. <i>Journal of Bacteriology</i> , 2008, 190, 6805-6810.	1.0	72
107	Function of a Chemotaxis-Like Signal Transduction Pathway in Modulating Motility, Cell Clumping, and Cell Length in the Alphaproteobacterium <i>Azospirillum brasilense</i> . <i>Journal of Bacteriology</i> , 2008, 190, 6365-6375.	1.0	64
108	Role of HAMP domains in chemotaxis signaling by bacterial chemoreceptors. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2008, 105, 16555-16560.	3.3	72
109	Protein exchange dynamics at chemoreceptor clusters in <i>Escherichia coli</i> . <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2008, 105, 6403-6408.	3.3	75
110	Modularity of stress response evolution. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2008, 105, 7500-7505.	3.3	53

#	ARTICLE	IF	CITATIONS
111	Regulatorische Prinzipien und Systemanalyse der bakteriellen Chemotaxis (Regulatory Principles and) Tj ETQq0 0 0 rgBT /Overlock 10 Tf	0.24	0
112	Evolution of Taxis Responses in Virtual Bacteria: Non-Adaptive Dynamics. PLoS Computational Biology, 2008, 4, e1000084.	1.5	36
113	Dynameomics: mass annotation of protein dynamics and unfolding in water by high-throughput atomistic molecular dynamics simulations. Protein Engineering, Design and Selection, 2008, 21, 353-368.	1.0	60
114	Interaction of CheY with the C-Terminal Peptide of CheZ. Journal of Bacteriology, 2008, 190, 1419-1428.	1.0	13
115	Transcriptional Analysis of <i>Clostridium beijerinckii</i> NCIMB 8052 and the Hyper-Butanol-Producing Mutant BA101 during the Shift from Acidogenesis to Solventogenesis. Applied and Environmental Microbiology, 2008, 74, 7709-7714.	1.4	78
116	A Sense of Self-Worth: Energy Taxis Provides Insight into How <i>Helicobacter pylori</i> Navigates through Its Environment. Journal of Bacteriology, 2008, 190, 3095-3097.	1.0	1
117	A bifunctional kinase-phosphatase in bacterial chemotaxis. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 18531-18536.	3.3	35
118	Phylogeny of Chemical Sensitivity. , 2008, , 1-25.		1
119	Bio-Communication of Bacteria and its Evolutionary Interrelations to Natural Genome Editing Competences of Viruses. Nature Precedings, 2008, , .	0.1	0
120	Bio-Communication of Bacteria and its Evolutionary Interrelations to Natural Genome Editing Competences of Viruses. Nature Precedings, 2008, , .	0.1	0
122	Quantitative analysis of signal transduction in motile and phototactic cells by computerized light stimulation and model based tracking. Review of Scientific Instruments, 2009, 80, 023709.	0.6	6
124	Functional Analysis of the <i>Helicobacter pylori</i> Flagellar Switch Proteins. Journal of Bacteriology, 2009, 191, 7147-7156.	1.0	64
125	Universal architecture of bacterial chemoreceptor arrays. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 17181-17186.	3.3	320
126	A molecular brake, not a clutch, stops the <i>Rhodobacter sphaeroides</i> flagellar motor. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 11582-11587.	3.3	71
127	<i>IN SILICO</i> SCREENING OF PROTEIN-PROTEIN INTERACTIONS WITH ALL-TO-ALL RIGID DOCKING AND CLUSTERING: AN APPLICATION TO PATHWAY ANALYSIS. Journal of Bioinformatics and Computational Biology, 2009, 07, 991-1012.	0.3	20
128	The Intersection of Theory and Application in Elucidating Pattern Formation in Developmental Biology. Mathematical Modelling of Natural Phenomena, 2009, 4, 3-82.	0.9	61
129	Flow-Based Microfluidic Device for Quantifying Bacterial Chemotaxis in Stable, Competing Gradients. Applied and Environmental Microbiology, 2009, 75, 4557-4564.	1.4	101
130	Dynamic map of protein interactions in the <i>Escherichia coli</i> chemotaxis pathway. Molecular Systems Biology, 2009, 5, 238.	3.2	84



#	ARTICLE	IF	CITATIONS
131	Surface Colonization by Marine Roseobacters: Integrating Genotype and Phenotype. Applied and Environmental Microbiology, 2009, 75, 6027-6037.	1.4	145
132	Motility and chemotaxis in alkaliphilic <i>Bacillus</i> species. Future Microbiology, 2009, 4, 1137-1149.	1.0	40
133	The Modular Organization of Protein Interactions in Escherichia coli. PLoS Computational Biology, 2009, 5, e1000523.	1.5	72
134	Chemotaxis. , 2009, , 71-78.		9
135	Role of Translational Coupling in Robustness of Bacterial Chemotaxis Pathway. PLoS Biology, 2009, 7, e1000171.	2.6	54
136	A Comparative Genomics, Network-Based Approach to Understanding Virulence in <i>Vibrio cholerae</i> . Journal of Bacteriology, 2009, 191, 6262-6272.	1.0	10
137	Spatiotemporal modelling of CheY complexes in Escherichia coli chemotaxis. Progress in Biophysics and Molecular Biology, 2009, 100, 40-46.	1.4	7
138	Introducing simulated cellular architecture to the quantitative analysis of fluorescent microscopy. Progress in Biophysics and Molecular Biology, 2009, 100, 25-32.	1.4	6
139	Equilibrium mechanisms of receptor clustering. Progress in Biophysics and Molecular Biology, 2009, 100, 18-24.	1.4	24
140	A model invalidation-based approach for elucidating biological signalling pathways, applied to the chemotaxis pathway in <i>R. sphaeroides</i> . BMC Systems Biology, 2009, 3, 105.	3.0	17
141	Escherichia coli. Biochemistry and Molecular Biology Education, 2009, 37, 325-332.	0.5	28
142	Parts exchange: tuning the flagellar motor to fit the conditions. Molecular Microbiology, 2009, 71, 807-810.	1.2	9
143	Making a grade: Sonic Hedgehog signalling and the control of neural cell fate. EMBO Journal, 2009, 28, 457-465.	3.5	63
144	Cell stimulation with optically manipulated microsources. Nature Methods, 2009, 6, 905-909.	9.0	89
145	Molecular networks and system-level properties. Journal of Biotechnology, 2009, 144, 224-233.	1.9	37
146	The Core Signaling Proteins of Bacterial Chemotaxis Assemble To Form an Ultrastable Complex. Biochemistry, 2009, 48, 6975-6987.	1.2	67
147	Functional characterization of FlgM in the regulation of flagellar synthesis and motility in Yersinia pseudotuberculosis. Microbiology (United Kingdom), 2009, 155, 1890-1900.	0.7	20
148	The Two Active Sites of <i>Thermotoga maritima</i> CheA Dimers Bind ATP with Dramatically Different Affinities. Biochemistry, 2009, 48, 6412-6422.	1.2	15

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149	The Structure of a Soluble Chemoreceptor Suggests a Mechanism for Propagating Conformational Signals. <i>Biochemistry</i> , 2009, 48, 1936-1944.	1.2	44
150	Thermal Domain Motions of CheA Kinase in Solution: Disulfide Trapping Reveals the Motional Constraints Leading to Trans-autophosphorylation. <i>Biochemistry</i> , 2009, 48, 3631-3644.	1.2	22
151	Probing the Roles of the Two Different Dimers Mediated by the Receiver Domain of the Response Regulator PhoB. <i>Journal of Molecular Biology</i> , 2009, 389, 349-364.	2.0	39
152	Self-Starting Micromotors in a Bacterial Bath. <i>Physical Review Letters</i> , 2009, 102, 048104.	2.9	227
153	Chapter 3 Diversity in Bacterial Chemotactic Responses and Niche Adaptation. <i>Advances in Applied Microbiology</i> , 2009, 66, 53-75.	1.3	87
154	Chemotaxis: how bacteria use memory. <i>Biological Chemistry</i> , 2009, 390, 1097-1104.	1.2	111
155	Handbook of Single-Molecule Biophysics. , 2009, , .		70
156	Protein carboxyl methylation and the biochemistry of memory. <i>Biological Chemistry</i> , 2009, 390, 1087-96.	1.2	14
157	Role of motility and chemotaxis in the pathogenesis of <i>Dickeya dadantii</i> 3937 (ex <i>Erwinia chrysanthemi</i> ) Tj ETQq0 0.0 rgBT /Overlock 10	0.7	101
158	Comparative Temporal Proteomics of a Response Regulator (SO2426)-Deficient Strain and Wild-Type <i>Shewanella oneidensis</i> MR-1 During Chromate Transformation. <i>Journal of Proteome Research</i> , 2009, 8, 59-71.	1.8	19
159	Sensory Transduction in Bacteria. , 2009, , 447-463.		4
160	Signal amplification in a lattice of coupled protein kinases. <i>Molecular BioSystems</i> , 2009, 5, 1853.	2.9	23
161	Chemotaxis-Like Regulatory Systems: Unique Roles in Diverse Bacteria. <i>Annual Review of Microbiology</i> , 2009, 63, 45-59.	2.9	105
162	Multiscale Models of Taxis-Driven Patterning in Bacterial Populations. <i>SIAM Journal on Applied Mathematics</i> , 2009, 70, 133-167.	0.8	145
163	Eukaryotic Chemotaxis: A Network of Signaling Pathways Controls Motility, Directional Sensing, and Polarity. <i>Annual Review of Biophysics</i> , 2010, 39, 265-289.	4.5	435
164	BioSimWare: A Software for the Modeling, Simulation and Analysis of Biological Systems. <i>Lecture Notes in Computer Science</i> , 2010, , 119-143.	1.0	7
165	Bacterial energy taxis: a global strategy?. <i>Archives of Microbiology</i> , 2010, 192, 507-520.	1.0	96
167	Reaction-Diffusion Systems in Intracellular Molecular Transport and Control. <i>Angewandte Chemie - International Edition</i> , 2010, 49, 4170-4198.	7.2	155

#	ARTICLE	IF	CITATIONS
168	Motility of bacteria in microfluidic structures. <i>Microelectronic Engineering</i> , 2010, 87, 810-813.	1.1	27
169	Molecular mechanisms underlying <i>roseobacter</i> –phytoplankton symbioses. <i>Current Opinion in Biotechnology</i> , 2010, 21, 332-338.	3.3	149
170	Engineering bacteria to recognize and follow small molecules. <i>Current Opinion in Biotechnology</i> , 2010, 21, 653-656.	3.3	19
171	A predictive computational model of the kinetic mechanism of stimulus-induced transducer methylation and feedback regulation through CheY in archaeal phototaxis and chemotaxis. <i>BMC Systems Biology</i> , 2010, 4, 27.	3.0	11
172	Identification and characterization of the aspartate chemosensory receptor of <i>Campylobacter jejuni</i> . <i>Molecular Microbiology</i> , 2010, 75, 710-730.	1.2	94
173	Specificity of localization and phosphotransfer in the CheA proteins of <i>Rhodobacter sphaeroides</i> . <i>Molecular Microbiology</i> , 2010, 76, 318-330.	1.2	23
174	The <i>Pseudomonas aeruginosa</i> Chp chemosensory system regulates intracellular cAMP levels by modulating adenylate cyclase activity. <i>Molecular Microbiology</i> , 2010, 76, 889-904.	1.2	146
175	Acetylation represses the binding of CheY to its target proteins. <i>Molecular Microbiology</i> , 2010, 76, 932-943.	1.2	55
176	A remote CheZ orthologue retains phosphatase function. <i>Molecular Microbiology</i> , 2010, 77, 225-235.	1.2	25
177	Reprogramming bacteria to seek and destroy an herbicide. <i>Nature Chemical Biology</i> , 2010, 6, 464-470.	3.9	155
178	Investigation of bacterial chemotaxis in flow-based microfluidic devices. <i>Nature Protocols</i> , 2010, 5, 864-872.	5.5	53
179	A field guide to bacterial swarming motility. <i>Nature Reviews Microbiology</i> , 2010, 8, 634-644.	13.6	1,180
180	Temporal dynamics and genetic diversity of chemotactic-competent microbial populations in the rhizosphere. <i>Environmental Microbiology</i> , 2010, 12, 3171-3184.	1.8	33
181	Structure and patterns in bacterial colonies. , 0, , 279-325.		3
182	Reverse Engineering of Bacterial Chemotaxis Pathway via Frequency Domain Analysis. <i>PLoS ONE</i> , 2010, 5, e9182.	1.1	8
183	Protein localization and dynamics within a bacterial organelle. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2010, 107, 5599-5604.	3.3	31
184	Biocharts: a visual formalism for complex biological systems. <i>Journal of the Royal Society Interface</i> , 2010, 7, 1015-1024.	1.5	24
185	Fractional chemotaxis diffusion equations. <i>Physical Review E</i> , 2010, 81, 051102.	0.8	61

#	ARTICLE	IF	CITATIONS
186	PAS domain containing chemoreceptor couples dynamic changes in metabolism with chemotaxis. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 2235-2240.	3.3	68
187	Identification of a Chemoreceptor for Tricarboxylic Acid Cycle Intermediates. Journal of Biological Chemistry, 2010, 285, 23126-23136.	1.6	87
188	Genetic Analysis of the Regulation of Type IV Pilus Function by the Chp Chemosensory System of <i>Pseudomonas aeruginosa</i> . Journal of Bacteriology, 2010, 192, 994-1010.	1.0	115
189	Using Structural Information to Change the Phosphotransfer Specificity of a Two-Component Chemotaxis Signalling Complex. PLoS Biology, 2010, 8, e1000306.	2.6	55
190	The MiST2 database: a comprehensive genomics resource on microbial signal transduction. Nucleic Acids Research, 2010, 38, D401-D407.	6.5	235
191	Chemotactic Response and Adaptation Dynamics in <i>Escherichia coli</i> . PLoS Computational Biology, 2010, 6, e1000784.	1.5	54
192	Phototactic and Chemotactic Signal Transduction by Transmembrane Receptors and Transducers in Microorganisms. Sensors, 2010, 10, 4010-4039.	2.1	27
193	A Bacterial Ras-Like Small GTP-Binding Protein and Its Cognate GAP Establish a Dynamic Spatial Polarity Axis to Control Directed Motility. PLoS Biology, 2010, 8, e1000430.	2.6	85
194	A Minimal Model of Metabolism-Based Chemotaxis. PLoS Computational Biology, 2010, 6, e1001004.	1.5	52
195	Crystal Structure of Activated CheY1 from <i>Helicobacter pylori</i> . Journal of Bacteriology, 2010, 192, 2324-2334.	1.0	20
196	Modeling Chemotaxis Reveals the Role of Reversed Phosphotransfer and a Bi-Functional Kinase-Phosphatase. PLoS Computational Biology, 2010, 6, e1000896.	1.5	29
197	Origins and Diversification of a Complex Signal Transduction System in Prokaryotes. Science Signaling, 2010, 3, ra50.	1.6	342
198	Aspartate chemosensory receptor signalling in <i>Campylobacter jejuni</i> . Virulence, 2010, 1, 414-417.	1.8	10
199	Microfluidics for bacterial chemotaxis. Integrative Biology (United Kingdom), 2010, 2, 604.	0.6	138
200	Adaptation and control circuits in bacterial chemotaxis. Biochemical Society Transactions, 2010, 38, 1265-1269.	1.6	22
201	Kinase-active Signaling Complexes of Bacterial Chemoreceptors Do Not Contain Proposed Receptor Receptor Contacts Observed in Crystal Structures. Biochemistry, 2010, 49, 1425-1434.	1.2	23
202	Structure of the Ternary Complex Formed by a Chemotaxis Receptor Signaling Domain, the CheA Histidine Kinase, and the Coupling Protein CheW As Determined by Pulsed Dipolar ESR Spectroscopy. Biochemistry, 2010, 49, 3824-3841.	1.2	73
203	Probing the Chemotaxis Periplasmic Sensor Domains from <i>Geobacter sulfurreducens</i> by Combined Resonance Raman and Molecular Dynamic Approaches: NO and CO Sensing. Journal of Physical Chemistry B, 2010, 114, 11251-11260.	1.2	15

#	ARTICLE	IF	CITATIONS
204	Microchannel-Nanopore Device for Bacterial Chemotaxis Assays. <i>Analytical Chemistry</i> , 2010, 82, 9357-9364.	3.2	16
205	Kinetics of ATP and TNP-ATP Binding to the Active Site of CheA from <i>Thermotoga maritima</i> . <i>Biochemistry</i> , 2010, 49, 5799-5809.	1.2	15
206	Bacterial chemoreceptors: providing enhanced features to two-component signaling. <i>Current Opinion in Microbiology</i> , 2010, 13, 124-132.	2.3	105
207	An MCP-Like Protein Interacts with the MamK Cytoskeleton and Is Involved in Magnetotaxis in <i>Magnetospirillum magneticum</i> AMB-1. <i>Journal of Molecular Biology</i> , 2010, 400, 309-322.	2.0	51
208	CheV: CheW-like coupling proteins at the core of the chemotaxis signaling network. <i>Trends in Microbiology</i> , 2010, 18, 494-503.	3.5	77
209	Isolation and characterization of a marine magnetotactic spirillum axenic culture QH-2 from an intertidal zone of the China Sea. <i>Research in Microbiology</i> , 2010, 161, 276-283.	1.0	90
210	Dynamics of Bacterial Swarming. <i>Biophysical Journal</i> , 2010, 98, 2082-2090.	0.2	247
211	Spatial organization in bacterial chemotaxis. <i>EMBO Journal</i> , 2010, 29, 2724-2733.	3.5	135
212	Biocommunication and Natural Genome Editing. , 2010, , .		37
213	Robust dynamical network reconstruction. , 2010, , .		8
214	Membrane Computing. <i>Lecture Notes in Computer Science</i> , 2011, , .	1.0	3
215	Molecular Behavior in Biological Cells: The Bacterial Cytoplasm as a Model System. , 2011, , 1-17.		0
216	Coordinated Reversal of Flagellar Motors on a Single <i>Escherichia coli</i> Cell. <i>Biophysical Journal</i> , 2011, 100, 2193-2200.	0.2	43
217	My Life with Nature. <i>Annual Review of Biochemistry</i> , 2011, 80, 42-70.	5.0	15
218	Bioenergetics: Cell Motility and Chemotaxis of Extreme Alkaliphiles. , 2011, , 141-162.		6
219	Motility and Chemotaxis in <i>Campylobacter</i> and <i>Helicobacter</i> . <i>Annual Review of Microbiology</i> , 2011, 65, 389-410.	2.9	278
220	Single-Molecule and Nanoscale Approaches to Biological Signaling. , 2011, , 287-323.		0
221	Parallel Computing Technologies. <i>Lecture Notes in Computer Science</i> , 2011, , .	1.0	0

#	ARTICLE	IF	CITATIONS
222	An insight into the interaction mode between CheB and chemoreceptor from two crystal structures of CheB methylesterase catalytic domain. <i>Biochemical and Biophysical Research Communications</i> , 2011, 411, 69-75.	1.0	5
223	Protein dynamics and mechanisms controlling the rotational behaviour of the bacterial flagellar motor. <i>Current Opinion in Microbiology</i> , 2011, 14, 734-740.	2.3	34
224	Structural insight into the low affinity between <i>Thermotoga maritima</i> CheA and CheB compared to their <i>Escherichia coli</i> / <i>Salmonella typhimurium</i> counterparts. <i>International Journal of Biological Macromolecules</i> , 2011, 49, 794-800.	3.6	2
225	Self-Assisted Amoeboid Navigation in Complex Environments. <i>PLoS ONE</i> , 2011, 6, e21955.	1.1	18
226	First passages for a search by a swarm of independent random searchers. <i>Journal of Statistical Mechanics: Theory and Experiment</i> , 2011, 2011, P06022.	0.9	100
227	Diversity at its best: bacterial taxis. <i>Environmental Microbiology</i> , 2011, 13, 1115-1124.	1.8	123
228	Bacterial chemotaxis towards aromatic hydrocarbons in <i>Pseudomonas</i> . <i>Environmental Microbiology</i> , 2011, 13, 1733-1744.	1.8	78
229	Chemotaxis kinase CheA is activated by three neighbouring chemoreceptor dimers as effectively as by receptor clusters. <i>Molecular Microbiology</i> , 2011, 79, 677-685.	1.2	38
230	Activated chemoreceptor arrays remain intact and hexagonally packed. <i>Molecular Microbiology</i> , 2011, 82, 748-757.	1.2	38
231	Characterization of cell surface and extracellular matrix remodeling of <i>Azospirillum brasilense</i> chemotaxis-like 1 signal transduction pathway mutants by atomic force microscopy. <i>FEMS Microbiology Letters</i> , 2011, 314, 131-139.	0.7	14
232	The chemotaxis-like Che1 pathway has an indirect role in adhesive cell properties of <i>Azospirillum brasilense</i> . <i>FEMS Microbiology Letters</i> , 2011, 323, 105-112.	0.7	21
233	Efficient modeling, simulation and coarse-graining of biological complexity with NFsim. <i>Nature Methods</i> , 2011, 8, 177-183.	9.0	271
234	Signal processing in complex chemotaxis pathways. <i>Nature Reviews Microbiology</i> , 2011, 9, 153-165.	13.6	366
235	Lateral density of receptor arrays in the membrane plane influences sensitivity of the <i>E. coli</i> chemotaxis response. <i>EMBO Journal</i> , 2011, 30, 1719-1729.	3.5	37
236	A CheR/CheB fusion protein is involved in cyst cell development and chemotaxis in <i>Azospirillum brasilense</i> Sp7. <i>Microbiological Research</i> , 2011, 166, 606-617.	2.5	5
237	Emergence of Memory in Reactive Agents Equipped With Environmental Markers. <i>IEEE Transactions on Autonomous Mental Development</i> , 2011, 3, 257-271.	2.3	13
238	Thermal Robustness: Lessons from Bacterial Chemotaxis. <i>Current Biology</i> , 2011, 21, R465-R468.	1.8	3
239	Quantifying Information Transmission in Eukaryotic Gradient Sensing and Chemotactic Response. <i>Journal of Statistical Physics</i> , 2011, 142, 1167-1186.	0.5	21

#	ARTICLE	IF	CITATIONS
240	In vitro experiments reconstituting topographic map formation. <i>E-Neuroforum</i> , 2011, 17, .	0.2	0
241	Genes for adaptation and learning spanning evolution: computational comparison between synaptic transmission and chemo-tactic signaling protein networks. <i>BMC Neuroscience</i> , 2011, 12, P97.	0.8	0
242	Comparative shotgun proteomic analysis of <i>Clostridium acetobutylicum</i> from butanol fermentation using glucose and xylose. <i>Proteome Science</i> , 2011, 9, 66.	0.7	24
243	Noise characteristics of the <i>Escherichia coli</i> rotary motor. <i>BMC Systems Biology</i> , 2011, 5, 151.	3.0	10
244	Crystallization and preliminary X-ray crystallographic analysis of CheW from <i>Thermotoga maritima</i> : a coupling protein of CheA and the chemotaxis receptor. <i>Acta Crystallographica Section F: Structural Biology Communications</i> , 2011, 67, 504-506.	0.7	2
245	Crystallization and preliminary X-ray crystallographic analysis of <i>Escherichia coli</i> CheA P3 dimerization domain. <i>Acta Crystallographica Section F: Structural Biology Communications</i> , 2011, 67, 662-664.	0.7	0
246	Genomic insights into the versatility of the plant growth-promoting bacterium <i>Azospirillum amazonense</i> . <i>BMC Genomics</i> , 2011, 12, 409.	1.2	43
247	Physiologically relevant divalent cations modulate citrate recognition by the McpS chemoreceptor. <i>Journal of Molecular Recognition</i> , 2011, 24, 378-385.	1.1	31
248	Robust dynamical network structure reconstruction. <i>Automatica</i> , 2011, 47, 1230-1235.	3.0	110
249	Coloured stochastic multilevel multiset rewriting. , 2011, , .		4
250	ChePep Controls <i>Helicobacter pylori</i> Infection of the Gastric Glands and Chemotaxis in the <i>Epsilonproteobacteria</i> . <i>MBio</i> , 2011, 2, .	1.8	112
251	Dynamics of Cooperativity in Chemical Sensing among Cell-Surface Receptors. <i>Physical Review Letters</i> , 2011, 107, 178101.	2.9	45
252	Subdiffusion, chemotaxis, and anomalous aggregation. <i>Physical Review E</i> , 2011, 83, 021110.	0.8	30
253	Change Is Good: Variations in Common Biological Mechanisms in the <i>Epsilonproteobacterial</i> Genera <i>Campylobacter</i> and <i>Helicobacter</i> . <i>Microbiology and Molecular Biology Reviews</i> , 2011, 75, 84-132.	2.9	75
254	Flagellin Redundancy in <i>Caulobacter crescentus</i> and Its Implications for Flagellar Filament Assembly. <i>Journal of Bacteriology</i> , 2011, 193, 2695-2707.	1.0	52
255	Identification of a Chemoreceptor Zinc-Binding Domain Common to Cytoplasmic Bacterial Chemoreceptors. <i>Journal of Bacteriology</i> , 2011, 193, 4338-4345.	1.0	33
256	Ligand Specificity Determined by Differentially Arranged Common Ligand-binding Residues in Bacterial Amino Acid Chemoreceptors Tsr and Tar. <i>Journal of Biological Chemistry</i> , 2011, 286, 42200-42210.	1.6	68
257	Protein-based analysis and other new and emerging non-nucleic acid based methods for tracing and investigating foodborne pathogens. , 2011, , 292-341.		3

#	ARTICLE	IF	CITATIONS
258	Identification of an Anchor Residue for CheA-CheY Interactions in the Chemotaxis System of <i>Escherichia coli</i> . <i>Journal of Bacteriology</i> , 2011, 193, 3894-3903.	1.0	6
259	Regulation of Flagellum Number by FliA and FlgM and Role in Biofilm Formation by <i>Rhodobacter sphaeroides</i> . <i>Journal of Bacteriology</i> , 2011, 193, 4010-4014.	1.0	32
260	New Motion Analysis System for Characterization of the Chemosensory Response Kinetics of <i>Rhodobacter sphaeroides</i> under Different Growth Conditions. <i>Applied and Environmental Microbiology</i> , 2011, 77, 4082-4088.	1.4	9
261	Chemoreceptors and Flagellar Motors Are Subterminally Located in Close Proximity at the Two Cell Poles in Spirochetes. <i>Journal of Bacteriology</i> , 2011, 193, 2652-2656.	1.0	36
262	The population dynamics of bacteria in physically structured habitats and the adaptive virtue of random motility. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2011, 108, 4047-4052.	3.3	55
263	In <i>Rhodobacter sphaeroides</i> , Chemotactic Operon 1 Regulates Rotation of the Flagellar System 2. <i>Journal of Bacteriology</i> , 2011, 193, 6781-6786.	1.0	13
264	Response rescaling in bacterial chemotaxis. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2011, 108, 13870-13875.	3.3	142
265	MODELING DIFFUSION IN A SIGNAL TRANSDUCTION PATHWAY: THE USE OF VIRTUAL VOLUMES IN P SYSTEMS. <i>International Journal of Foundations of Computer Science</i> , 2011, 22, 89-96.	0.8	6
266	Activated Membrane Patches Guide Chemotactic Cell Motility. <i>PLoS Computational Biology</i> , 2011, 7, e1002044.	1.5	64
267	Feedback Control Architecture and the Bacterial Chemotaxis Network. <i>PLoS Computational Biology</i> , 2011, 7, e1001130.	1.5	20
268	Radial and Spiral Stream Formation in <i>Proteus mirabilis</i> Colonies. <i>PLoS Computational Biology</i> , 2011, 7, e1002332.	1.5	34
269	A Protein Thermometer Controls Temperature-Dependent Transcription of Flagellar Motility Genes in <i>Listeria monocytogenes</i> . <i>PLoS Pathogens</i> , 2011, 7, e1002153.	2.1	81
270	Three Types of Taxis Used in the Response of <i>Acidovorax</i> sp. Strain JS42 to 2-Nitrotoluene. <i>Applied and Environmental Microbiology</i> , 2012, 78, 2306-2315.	1.4	26
271	The Cell as a Thermostat: How Much does it Know?. <i>Advances in Experimental Medicine and Biology</i> , 2012, 736, 193-198.	0.8	8
272	Conformational Spread in the Flagellar Motor Switch: A Model Study. <i>PLoS Computational Biology</i> , 2012, 8, e1002523.	1.5	13
273	Mechanism of Bacterial Signal Transduction Revealed by Molecular Dynamics of Tsr Dimers and Trimers of Dimers in Lipid Vesicles. <i>PLoS Computational Biology</i> , 2012, 8, e1002685.	1.5	37
274	Stochastic coordination of multiple actuators reduces latency and improves chemotactic response in bacteria. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2012, 109, 805-810.	3.3	54
275	The <i>Azospirillum brasilense</i> Che1 Chemotaxis Pathway Controls Swimming Velocity, Which Affects Transient Cell-to-Cell Clumping. <i>Journal of Bacteriology</i> , 2012, 194, 3343-3355.	1.0	45



#	ARTICLE	IF	CITATIONS
276	Three-Dimensional Structures of Pathogenic and Saprophytic <i>Leptospira</i> Species Revealed by Cryo-Electron Tomography. <i>Journal of Bacteriology</i> , 2012, 194, 1299-1306.	1.0	69
277	<i>Helicobacter pylori</i> Requires TlpD-Driven Chemotaxis To Proliferate in the Antrum. <i>Infection and Immunity</i> , 2012, 80, 3713-3720.	1.0	64
278	<i>Borrelia burgdorferi</i> Needs Chemotaxis To Establish Infection in Mammals and To Accomplish Its Enzootic Cycle. <i>Infection and Immunity</i> , 2012, 80, 2485-2492.	1.0	62
279	A Single-Domain FlgJ Contributes to Flagellar Hook and Filament Formation in the Lyme Disease Spirochete <i>Borrelia burgdorferi</i> . <i>Journal of Bacteriology</i> , 2012, 194, 866-874.	1.0	18
280	Methylation and in vivo expression of the surface-exposed <i>Leptospira interrogans</i> outer-membrane protein OmpL32. <i>Microbiology (United Kingdom)</i> , 2012, 158, 622-635.	0.7	27
281	Bacterial chemoreceptor arrays are hexagonally packed trimers of receptor dimers networked by rings of kinase and coupling proteins. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2012, 109, 3766-3771.	3.3	247
282	Coordinated regulation of multiple flagellar motors by the <i>Escherichia coli</i> chemotaxis system. <i>Biophysics (Nagoya-shi, Japan)</i> , 2012, 8, 59-66.	0.4	8
283	Chemotactic adaptation kinetics of individual <i>Escherichia coli</i> cells. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2012, 109, 9869-9874.	3.3	44
284	Design of biomolecular network modifications to achieve adaptation. <i>IET Systems Biology</i> , 2012, 6, 223-231.	0.8	16
285	Chemotaxis in <i>Campylobacter jejuni</i> . <i>European Journal of Microbiology and Immunology</i> , 2012, 2, 24-31.	1.5	43
286	A parallel diffusion-based microfluidic device for bacterial chemotaxis analysis. <i>Lab on A Chip</i> , 2012, 12, 1389.	3.1	54
287	Ecology and Physics of Bacterial Chemotaxis in the Ocean. <i>Microbiology and Molecular Biology Reviews</i> , 2012, 76, 792-812.	2.9	230
288	Role for <i>cheR</i> of <i>Vibrio fischeri</i> in the <i>Vibrio</i> "squid symbiosis. <i>Canadian Journal of Microbiology</i> , 2012, 58, 29-38.	0.8	18
289	Transport of self-propelling bacteria in micro-channel flow. <i>Journal of Physics Condensed Matter</i> , 2012, 24, 065101.	0.7	54
290	Normativity, agency, and life. <i>Studies in History and Philosophy of Science Part C: Studies in History and Philosophy of Biological and Biomedical Sciences</i> , 2012, 43, 92-103.	0.8	12
291	Computational and Experimental Analyses Reveal the Essential Roles of Interdomain Linkers in the Biological Function of Chemotaxis Histidine Kinase CheA. <i>Journal of the American Chemical Society</i> , 2012, 134, 16107-16110.	6.6	36
292	CheA "Receptor Interaction Sites in Bacterial Chemotaxis. <i>Journal of Molecular Biology</i> , 2012, 422, 282-290.	2.0	42
293	The Unique Paradigm of Spirochete Motility and Chemotaxis. <i>Annual Review of Microbiology</i> , 2012, 66, 349-370.	2.9	170

#	ARTICLE	IF	CITATIONS
294	Genome-wide dynamic transcriptional profiling in <i>clostridium beijerinckii</i> NCIMB 8052 using single-nucleotide resolution RNA-Seq. <i>BMC Genomics</i> , 2012, 13, 102.	1.2	72
295	Opposite responses by different chemoreceptors set a tunable preference point in <i>Escherichia coli</i> pH taxis. <i>Molecular Microbiology</i> , 2012, 86, 1482-1489.	1.2	70
296	8.4 The Rotary Bacterial Flagellar Motor. , 2012, , 50-71.		2
297	Self-Association of the Histidine Kinase CheA as Studied by Pulsed Dipolar ESR Spectroscopy. <i>Biophysical Journal</i> , 2012, 102, 2192-2201.	0.2	22
298	The actions of bismuth in the treatment of <i>Helicobacter pylori</i> infections: an update. <i>Metallomics</i> , 2012, 4, 239.	1.0	45
299	Morphology and nature of micro-organisms. , 2012, , 9-23.		0
300	Combining qualitative information and semi-quantitative data for guaranteed invalidation of biochemical network models. <i>International Journal of Robust and Nonlinear Control</i> , 2012, 22, 1157-1173.	2.1	21
301	Chemotaxis of <i>Marinobacter adhaerens</i> and Its Impact on Attachment to the Diatom <i>Thalassiosira weissflogii</i> . <i>Applied and Environmental Microbiology</i> , 2012, 78, 6900-6907.	1.4	72
302	Cell orientation of swimming bacteria: From theoretical simulation to experimental evaluation. <i>Science China Life Sciences</i> , 2012, 55, 202-209.	2.3	11
303	The orphan histidine protein kinase SgmT is a cAMP receptor and regulates composition of the extracellular matrix together with the orphan DNA binding response regulator DigR in <i>Myxococcus xanthus</i> . <i>Molecular Microbiology</i> , 2012, 84, 147-165.	1.2	52
304	Key physiological properties contributing to rhizosphere adaptation and plant growth promotion abilities of <i>Azospirillum brasilense</i> . <i>FEMS Microbiology Letters</i> , 2012, 326, 99-108.	0.7	175
305	From individual cell motility to collective behaviors: insights from a prokaryote, <i>Myxococcus xanthus</i> . <i>FEMS Microbiology Reviews</i> , 2012, 36, 149-164.	3.9	112
306	Responding to chemical gradients: bacterial chemotaxis. <i>Current Opinion in Cell Biology</i> , 2012, 24, 262-268.	2.6	437
307	Crystallization and preliminary X-ray crystallographic analysis of <i>Thermotoga maritima</i> CheA P3-P4-P5 domains in complex with CheW. <i>Acta Crystallographica Section F: Structural Biology Communications</i> , 2012, 68, 713-715.	0.7	0
308	<i>Salmonella</i> chemoreceptors McpB and McpC mediate a repellent response to L-cysteine: a potential mechanism to avoid oxidative conditions. <i>Molecular Microbiology</i> , 2012, 84, 697-711.	1.2	16
309	Two CheW coupling proteins are essential in a chemosensory pathway of <i>Borrelia burgdorferi</i> . <i>Molecular Microbiology</i> , 2012, 85, 782-794.	1.2	27
310	Interplay of RsbM and RsbK controls the $\sigma^B$ activity of <i>Bacillus cereus</i> . <i>Environmental Microbiology</i> , 2012, 14, 2788-2799.	1.8	9
311	Active Brownian particles. <i>European Physical Journal: Special Topics</i> , 2012, 202, 1-162.	1.2	816

#	ARTICLE	IF	CITATIONS
312	Genomic Analysis Reveals Multiple [FeFe] Hydrogenases and Hydrogen Sensors Encoded by Treponemes from the H <sub>2</sub> -Rich Termite Gut. <i>Microbial Ecology</i> , 2012, 63, 282-294.	1.4	20
313	Acetylation reduces the ability of CheY to undergo autophosphorylation. <i>FEMS Microbiology Letters</i> , 2013, 347, 70-76.	0.7	8
314	Cooperative Control Design for Nanorobots in Drug Delivery. , 2013, , 101-123.		4
315	Comparative genomic analysis of four representative plant growth-promoting rhizobacteria in <i>Pseudomonas</i> . <i>BMC Genomics</i> , 2013, 14, 271.	1.2	142
316	Selected Topics in Micro/Nano-robotics for Biomedical Applications. , 2013, , .		2
317	Designing a C84 fullerene as a specific voltage-gated sodium channel blocker. <i>Nanoscale Research Letters</i> , 2013, 8, 323.	3.1	8
318	Effect of AI crude extract on PHB accumulation and hydrogen photoproduction in <i>Rhodobacter sphaeroides</i> . <i>International Journal of Hydrogen Energy</i> , 2013, 38, 15770-15776.	3.8	11
319	A phenylalanine rotameric switch for signal-state control in bacterial chemoreceptors. <i>Nature Communications</i> , 2013, 4, 2881.	5.8	37
320	Effects of supplementary butyrate on butanol production and the metabolic switch in <i>Clostridium beijerinckii</i> NCIMB 8052: genome-wide transcriptional analysis with RNA-Seq. <i>Biotechnology for Biofuels</i> , 2013, 6, 138.	6.2	50
321	Precision Sensing by Two Opposing Gradient Sensors: How Does <i>Escherichia coli</i> Find its Preferred pH Level?. <i>Biophysical Journal</i> , 2013, 105, 276-285.	0.2	17
322	Microbial metabolic exchange in 3D. <i>ISME Journal</i> , 2013, 7, 770-780.	4.4	73
323	Symbiosis between the cyanobacterium <i>Nostoc</i> and the liverwort <i>Blasia</i> requires a CheR-type MCP methyltransferase. <i>Symbiosis</i> , 2013, 59, 111-120.	1.2	27
324	The effects of nutrient chemotaxis on bacterial aggregation patterns with non-linear degenerate cross diffusion. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2013, 392, 5644-5662.	1.2	33
325	The crystal structure of an activated <i>Thermotoga maritima</i> CheY with N-terminal region of FlIM. <i>International Journal of Biological Macromolecules</i> , 2013, 54, 76-83.	3.6	17
326	Tracking Shallow Chemical Gradients by Actin-Driven Wandering of the Polarization Site. <i>Current Biology</i> , 2013, 23, 32-41.	1.8	103
327	A supplemented soft agar chemotaxis assay demonstrates the <i>Helicobacter pylori</i> chemotactic response to zinc and nickel. <i>Microbiology (United Kingdom)</i> , 2013, 159, 46-57.	0.7	44
328	Swimming motility plays a key role in the stochastic dynamics of cell clumping. <i>Physical Biology</i> , 2013, 10, 026005.	0.8	7
329	Systems-based approaches toward wound healing. <i>Pediatric Research</i> , 2013, 73, 553-563.	1.1	76

#	ARTICLE	IF	CITATIONS
330	Regulation of flagellar motility during biofilm formation. <i>FEMS Microbiology Reviews</i> , 2013, 37, 849-871.	3.9	447
331	<i>Pseudomonas putida</i> F1 has multiple chemoreceptors with overlapping specificity for organic acids. <i>Microbiology (United Kingdom)</i> , 2013, 159, 1086-1096.	0.7	49
332	Effects of learning on evolution: robustness, innovation and speciation. <i>Animal Behaviour</i> , 2013, 85, 1023-1030.	0.8	103
333	The eclipse of heritability and the foundations of intelligence. <i>New Ideas in Psychology</i> , 2013, 31, 122-129.	1.2	3
334	The 3.2 Å... Resolution Structure of a Receptor:CheA:CheW Signaling Complex Defines Overlapping Binding Sites and Key Residue Interactions within Bacterial Chemosensory Arrays. <i>Biochemistry</i> , 2013, 52, 3852-3865.	1.2	80
335	A single phosphatase can convert a robust step response into a graded, tunable or adaptive response. <i>Microbiology (United Kingdom)</i> , 2013, 159, 1276-1285.	0.7	15
337	Engineering Bacterial Two-Component System PmrA/PmrB to Sense Lanthanide Ions. <i>Journal of the American Chemical Society</i> , 2013, 135, 2037-2039.	6.6	29
338	Continuous-time random walks on networks with vertex- and time-dependent forcing. <i>Physical Review E</i> , 2013, 88, 022811.	0.8	12
339	Aerotaxis governs floating biofilm formation in <i>Sewanella oneidensis</i> . <i>Environmental Microbiology</i> , 2013, 15, 3108-3118.	1.8	26
340	Integration of the Second Messenger c-di-GMP into the Chemotactic Signaling Pathway. <i>MBio</i> , 2013, 4, e00001-13.	1.8	59
341	Taxis of <i>Pseudomonas putida</i> F1 toward Phenylacetic Acid Is Mediated by the Energy Taxis Receptor Aer2. <i>Applied and Environmental Microbiology</i> , 2013, 79, 2416-2423.	1.4	35
342	Conformational Coupling between Receptor and Kinase Binding Sites through a Conserved Salt Bridge in a Signaling Complex Scaffold Protein. <i>PLoS Computational Biology</i> , 2013, 9, e1003337.	1.5	13
343	Adaptation Dynamics in Densely Clustered Chemoreceptors. <i>PLoS Computational Biology</i> , 2013, 9, e1003230.	1.5	23
344	Response kinetics in the complex chemotaxis signalling pathway of <i>Rhodobacter sphaeroides</i> . <i>Journal of the Royal Society Interface</i> , 2013, 10, 20121001.	1.5	15
345	Load-Dependent Assembly of the Bacterial Flagellar Motor. <i>MBio</i> , 2013, 4, .	1.8	166
346	Chemoreceptor Gene Loss and Acquisition via Horizontal Gene Transfer in <i>Escherichia coli</i> . <i>Journal of Bacteriology</i> , 2013, 195, 3596-3602.	1.0	11
347	Data-driven quantification of the robustness and sensitivity of cell signaling networks. <i>Physical Biology</i> , 2013, 10, 066002.	0.8	4
348	<i>myo</i> -Inositol and <i>d</i> -Ribose Ligand Discrimination in an ABC Periplasmic Binding Protein. <i>Journal of Bacteriology</i> , 2013, 195, 2379-2388.	1.0	14

#	ARTICLE	IF	CITATIONS
349	Cell responses only partially shape cell-to-cell variations in protein abundances in <i>Escherichia coli</i> chemotaxis. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 18531-18536.	3.3	16
350	Analysis of periplasmic sensor domains from <i>Anaeromyxobacter dehalogenans</i> CP: Structure of one sensor domain from a histidine kinase and another from a chemotaxis protein. MicrobiologyOpen, 2013, 2, 766-777.	1.2	7
351	A Chemotactic Model for Interaction of Antagonistic Microflora Colonies: Front Asymptotics and Numerical Simulations. Studies in Applied Mathematics, 2013, 130, 264-294.	1.1	1
352	Tactic responses to pollutants and their potential to increase biodegradation efficiency. Journal of Applied Microbiology, 2013, 114, 923-933.	1.4	40
353	Modulation of potential respiratory pathogens by pH1N1 viral infection. Clinical Microbiology and Infection, 2013, 19, 930-935.	2.8	59
354	<i>C. omamonas testosteroni</i> uses a chemoreceptor for tricarboxylic acid cycle intermediates to trigger chemotactic responses towards aromatic compounds. Molecular Microbiology, 2013, 90, 813-823.	1.2	62
355	Directional sensing by cooperative chemoreceptor arrays modeled as Monod-Wyman-Changeux clusters. Physical Review E, 2013, 87, .	0.8	1
356	Biocharts: Unifying Biological Hypotheses with Models and Experiments. , 2013, , .		1
357	Structure and Activity of the Flagellar Rotor Protein FliY. Journal of Biological Chemistry, 2013, 288, 13493-13502.	1.6	38
358	Azospirillum -Plant Interaction. , 2013, , 237-269.		8
359	Importance of Motile and Biofilm Lifestyles of Rhizobia for the Establishment of Symbiosis with Legumes. , 2013, , 47-69.		1
360	Gimme shelter: how <i>Vibrio fischeri</i> successfully navigates an animal's multiple environments. Frontiers in Microbiology, 2013, 4, 356.	1.5	37
361	Stability of Multispecies Bacterial Communities: Signaling Networks May Stabilize Microbiomes. PLoS ONE, 2013, 8, e57947.	1.1	17
362	Homology Modeling of the CheW Coupling Protein of the Chemotaxis Signaling Complex. PLoS ONE, 2013, 8, e70705.	1.1	5
363	The embodied transcendental: a Kantian perspective on neurophenomenology. Frontiers in Human Neuroscience, 2013, 7, 611.	1.0	24
364	Effect of Bodily Fluids from Honey Bee ( <i>Apis mellifera</i> ) Larvae on Growth and Genome-Wide Transcriptional Response of the Causal Agent of American Foulbrood Disease ( <i>Paenibacillus larvae</i> ). PLoS ONE, 2014, 9, e89175.	1.1	1
365	Biological noise to get a sense of direction: an analogy between chemotaxis and stress response. Frontiers in Genetics, 2014, 5, 52.	1.1	1
366	Emotion: the Self-regulatory Sense. Global Advances in Health and Medicine, 2014, 3, 80-108.	0.7	26

#	ARTICLE	IF	CITATIONS
367	Biologically-inspired behaviour based robotics for making invisible pollution visible: a survey. <i>Advanced Robotics</i> , 2014, 28, 271-288.	1.1	8
368	Thermal control of virulence factors in bacteria: A hot topic. <i>Virulence</i> , 2014, 5, 852-862.	1.8	58
369	Genomic versatility and functional variation between two dominant heterotrophic symbionts of deep-sea <i>Osedax</i> worms. <i>ISME Journal</i> , 2014, 8, 908-924.	4.4	32
370	Predicting Chemical Environments of Bacteria from Receptor Signaling. <i>PLoS Computational Biology</i> , 2014, 10, e1003870.	1.5	27
371	Characterization of the surfaceome of the metal-reducing bacterium <i>Desulfotomaculum reducens</i> . <i>Frontiers in Microbiology</i> , 2014, 5, 432.	1.5	22
372	Requirements for <i>Pseudomonas aeruginosa</i> Acute Burn and Chronic Surgical Wound Infection. <i>PLoS Genetics</i> , 2014, 10, e1004518.	1.5	301
373	A Network Characteristic That Correlates Environmental and Genetic Robustness. <i>PLoS Computational Biology</i> , 2014, 10, e1003474.	1.5	4
374	Grappling archaea: ultrastructural analyses of an uncultivated, cold-loving archaeon, and its biofilm. <i>Frontiers in Microbiology</i> , 2014, 5, 397.	1.5	26
375	Behaviors and Strategies of Bacterial Navigation in Chemical and Nonchemical Gradients. <i>PLoS Computational Biology</i> , 2014, 10, e1003672.	1.5	27
376	Diverse and divergent protein post-translational modifications in two growth stages of a natural microbial community. <i>Nature Communications</i> , 2014, 5, 4405.	5.8	51
378	Internal Sense of Direction: Sensing and Signaling from Cytoplasmic Chemoreceptors. <i>Microbiology and Molecular Biology Reviews</i> , 2014, 78, 672-684.	2.9	38
379	Cytosine chemoreceptor <i>McpC</i> in <i>Pseudomonas putida</i> F1 also detects nicotinic acid. <i>Microbiology (United Kingdom)</i> , 2014, 160, 2661-2669.	0.7	8
380	<i>Rhodobacter sphaeroides</i> , a novel tumor-targeting bacteria that emits natural near-infrared fluorescence. <i>Microbiology and Immunology</i> , 2014, 58, 172-179.	0.7	16
381	Mesenchymal Chemotaxis Requires Selective Inactivation of Myosin II at the Leading Edge via a Noncanonical $PLC\beta_3/PKC\delta$ Pathway. <i>Developmental Cell</i> , 2014, 31, 747-760.	3.1	72
382	Direct Imaging of Intracellular Signaling Components That Regulate Bacterial Chemotaxis. <i>Science Signaling</i> , 2014, 7, ra32.	1.6	35
383	Beyond gene expression: The impact of protein post-translational modifications in bacteria. <i>Journal of Proteomics</i> , 2014, 97, 265-286.	1.2	176
384	Insights into the Biology of <i>Borrelia burgdorferi</i> Gained Through the Application of Molecular Genetics. <i>Advances in Applied Microbiology</i> , 2014, 86, 41-143.	1.3	38
385	Understanding system dynamics of an adaptive enzyme network from globally profiled kinetic parameters. <i>BMC Systems Biology</i> , 2014, 8, 4.	3.0	38

#	ARTICLE	IF	CITATIONS
386	Ultrasensitivity in independent multisite systems. <i>Journal of Mathematical Biology</i> , 2014, 69, 977-999.	0.8	9
387	Chemosensory signaling systems that control bacterial survival. <i>Trends in Microbiology</i> , 2014, 22, 389-398.	3.5	96
388	InÂVivo Kinetics of Segregation and Polar Retention of MS2-GFP-RNA Complexes in <i>Escherichia coli</i> . <i>Biophysical Journal</i> , 2014, 106, 1928-1937.	0.2	28
389	Polar localization of <i>Escherichia coli</i> chemoreceptors requires an intact Tol-Pal complex. <i>Molecular Microbiology</i> , 2014, 92, 985-1004.	1.2	61
390	A minimal model for metabolism-dependent chemotaxis in <i>Rhodobacter sphaeroides</i> . <i>Interface Focus</i> , 2014, 4, 20140002.	1.5	3
391	Cell Division Resets Polarity and Motility for the Bacterium <i>Myxococcus xanthus</i> . <i>Journal of Bacteriology</i> , 2014, 196, 3853-3861.	1.0	8
392	Diversity of Magneto-Aerotactic Behaviors and Oxygen Sensing Mechanisms in Cultured Magnetotactic Bacteria. <i>Biophysical Journal</i> , 2014, 107, 527-538.	0.2	122
393	Single-Cell <i>E. coli</i> Response to an Instantaneously Applied Chemotactic Signal. <i>Biophysical Journal</i> , 2014, 107, 730-739.	0.2	28
394	A High-Performance Microbial Battery Based on the Chemotactic Biofilm of a Motile Microaerophilic Bacterium. <i>Energy Technology</i> , 2014, 2, 625-633.	1.8	1
395	Functional and proteomic analyses reveal that <i>wxcB</i> is involved in virulence, motility, detergent tolerance, and biofilm formation in <i>Xanthomonas campestris</i> pv. <i>vesicatoria</i> . <i>Biochemical and Biophysical Research Communications</i> , 2014, 452, 389-394.	1.0	32
396	Characterization and reactivity of broiler chicken sera to selected recombinant <i>Campylobacter jejuni</i> chemotactic proteins. <i>Archives of Microbiology</i> , 2014, 196, 375-383.	1.0	4
397	Parasite Fitness Traits Under Environmental Variation: Disentangling the Roles of a Chytrid's Immediate Host and External Environment. <i>Microbial Ecology</i> , 2014, 68, 645-656.	1.4	20
398	Spatial variability of bacteria in the rhizosphere of <i>Elsholtzia splendens</i> under Cu contamination. <i>Environmental Science and Pollution Research</i> , 2014, 21, 9809-9818.	2.7	4
399	Fold-Change Detection in a Whole-Pathway Model of <i>Escherichia coli</i> chemotaxis. <i>Bulletin of Mathematical Biology</i> , 2014, 76, 1376-1395.	0.9	2
400	Molecular Architecture of the Bacterial Flagellar Motor in Cells. <i>Biochemistry</i> , 2014, 53, 4323-4333.	1.2	124
401	A Pathway-Based Mean-Field Model for <i>E. coli</i> Chemotaxis: Mathematical Derivation and Its Hyperbolic and Parabolic Limits. <i>Multiscale Modeling and Simulation</i> , 2014, 12, 907-926.	0.6	19
402	Fluid Flow and Particle Dynamics Inside an Evaporating Droplet Containing Live Bacteria Displaying Chemotaxis. <i>Langmuir</i> , 2014, 30, 12144-12153.	1.6	22
403	The Linker between the Dimerization and Catalytic Domains of the CheA Histidine Kinase Propagates Changes in Structure and Dynamics That Are Important for Enzymatic Activity. <i>Biochemistry</i> , 2014, 53, 855-861.	1.2	36

#	ARTICLE	IF	CITATIONS
404	Mutational Analysis of the P1 Phosphorylation Domain in Escherichia coli CheA, the Signaling Kinase for Chemotaxis. <i>Journal of Bacteriology</i> , 2014, 196, 257-264.	1.0	17
405	Thermodynamic and kinetic characterization of two methyl-accepting chemotaxis heme sensors from <i>Geobacter sulfurreducens</i> reveals the structural origin of their functional difference. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , 2014, 1837, 920-928.	0.5	4
406	A self-swimming microbial robot using microfabricated nanofibrous hydrogel. <i>Sensors and Actuators B: Chemical</i> , 2014, 202, 301-306.	4.0	22
407	Comparative genomic analysis provides insights into the evolution and niche adaptation of marine <i>Magnetospira</i> sp. QH strain. <i>Environmental Microbiology</i> , 2014, 16, 525-544.	1.8	66
408	Virulence mechanisms of bacterial aquaculture pathogens and antivirulence therapy for aquaculture. <i>Reviews in Aquaculture</i> , 2014, 6, 100-114.	4.6	73
410	Metagenomic sequencing of bile from gallstone patients to identify different microbial community patterns and novel biliary bacteria. <i>Scientific Reports</i> , 2015, 5, 17450.	1.6	70
412	The Role of Very Low-Reynolds Hydrodynamics on the Transfer of Information Among Active Agents. <i>Journal of Statistical Physics</i> , 2015, 161, 1390-1403.	0.5	1
413	<i>Helicobacter pylori</i> C <sub>HP</sub> and C <sub>HP</sub> P <sub>ep</sub> form a novel chemotaxis regulatory complex distinct from the core chemotaxis signaling proteins and the flagellar motor. <i>Molecular Microbiology</i> , 2015, 97, 1063-1078.	1.2	29
414	RpoS and quorum sensing control expression and polar localization of <i>Vibrio cholerae</i> chemotaxis cluster III proteins <i>in vitro</i> and <i>in vivo</i> . <i>Molecular Microbiology</i> , 2015, 97, 660-675.	1.2	26
415	Transducer like proteins of <i>Campylobacter jejuni</i> 81-176: role in chemotaxis and colonization of the chicken gastrointestinal tract. <i>Frontiers in Cellular and Infection Microbiology</i> , 2015, 5, 46.	1.8	43
416	Macrolactone Nuiapolide, Isolated from a Hawaiian Marine Cyanobacterium, Exhibits Anti-Chemotactic Activity. <i>Marine Drugs</i> , 2015, 13, 6274-6290.	2.2	12
417	Ants Discriminate Between Different Hydrocarbon Concentrations. <i>Frontiers in Ecology and Evolution</i> , 2015, 3, .	1.1	15
418	The cognitive cell: bacterial behavior reconsidered. <i>Frontiers in Microbiology</i> , 2015, 6, 264.	1.5	194
419	VarR controls colonization and virulence in the marine macroalgal pathogen <i>Nautella italica</i> R11. <i>Frontiers in Microbiology</i> , 2015, 6, 1130.	1.5	19
420	Elements of the cellular metabolic structure. <i>Frontiers in Molecular Biosciences</i> , 2015, 2, 16.	1.6	33
421	The Gut Bacterium <i>Bacteroides thetaiotaomicron</i> Influences the Virulence Potential of the Enterohemorrhagic <i>Escherichia coli</i> O103:H25. <i>PLoS ONE</i> , 2015, 10, e0118140.	1.1	16
422	Evolution and Design Governing Signal Precision and Amplification in a Bacterial Chemosensory Pathway. <i>PLoS Genetics</i> , 2015, 11, e1005460.	1.5	33
423	A Longitudinal Study of the Feline Faecal Microbiome Identifies Changes into Early Adulthood Irrespective of Sexual Development. <i>PLoS ONE</i> , 2015, 10, e0144881.	1.1	54



#	ARTICLE	IF	CITATIONS
424	Importance of Multiple Methylation Sites in Escherichia coli Chemotaxis. PLoS ONE, 2015, 10, e0145582.	1.1	15
425	CryoEM and computer simulations reveal a novel kinase conformational switch in bacterial chemotaxis signaling. ELife, 2015, 4, .	2.8	106
426	A two-component regulatory system modulates twitching motility in Dichelobacter nodosus. Veterinary Microbiology, 2015, 179, 34-41.	0.8	11
427	Gene inactivation of a chemotaxis operon in the pathogen Leptospira interrogans. FEMS Microbiology Letters, 2015, 362, 1-8.	0.7	32
428	Adaptations of Prokaryotes to Their Biotopes and to Physicochemical Conditions in Natural or Anthropized Environments. , 2015, , 293-351.		5
429	Environmental Sensing in Actinobacteria: a Comprehensive Survey on the Signaling Capacity of This Phylum. Journal of Bacteriology, 2015, 197, 2517-2535.	1.0	54
430	Bacteria-based microrobot for chemotaxis delivery. , 2015, , .		3
431	Role of <i>Dickeya dadantii</i> 3937 chemoreceptors in the entry to Arabidopsis leaves through wounds. Molecular Plant Pathology, 2015, 16, 685-698.	2.0	24
432	Live from under the lens: exploring microbial motility with dynamic imaging and microfluidics. Nature Reviews Microbiology, 2015, 13, 761-775.	13.6	134
433	Campylobacter virulence and survival factors. Food Microbiology, 2015, 48, 99-108.	2.1	282
434	Integration of chemotaxis, transport and catabolism in <i>Pseudomonas putida</i> and identification of the aromatic acid chemoreceptor PcaY. Molecular Microbiology, 2015, 96, 134-147.	1.2	54
435	Aggregation-fragmentation model of robust concentration gradient formation. Physical Review E, 2015, 91, 022704.	0.8	8
436	A high-throughput screen for ligand binding reveals the specificities of three amino acid chemoreceptors from <i>Pseudomonas syringae</i> pv. <i>actinidiae</i> . Molecular Microbiology, 2015, 96, 694-707.	1.2	67
437	Sudden motility reversal indicates sensing of magnetic field gradients in <i>Magnetospirillum magneticum</i> AMB-1 strain. ISME Journal, 2015, 9, 1399-1409.	4.4	20
438	Chemotaxis by natural populations of coral reef bacteria. ISME Journal, 2015, 9, 1764-1777.	4.4	60
439	PilB localization correlates with the direction of twitching motility in the cyanobacterium <i>Synechocystis</i> sp. PCC 6803. Microbiology (United Kingdom), 2015, 161, 960-966.	0.7	51
440	Mechanics of torque generation in the bacterial flagellar motor. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, E4381-9.	3.3	48
441	Preformed Soluble Chemoreceptor Trimers That Mimic Cellular Assembly States and Activate CheA Autophosphorylation. Biochemistry, 2015, 54, 3454-3468.	1.2	14

#	ARTICLE	IF	CITATIONS
442	Chemotaxis Control of Transient Cell Aggregation. <i>Journal of Bacteriology</i> , 2015, 197, 3230-3237.	1.0	59
443	Bacterial protein networks: properties and functions. <i>Nature Reviews Microbiology</i> , 2015, 13, 559-572.	13.6	86
444	The Hidden World within Plants: Ecological and Evolutionary Considerations for Defining Functioning of Microbial Endophytes. <i>Microbiology and Molecular Biology Reviews</i> , 2015, 79, 293-320.	2.9	1,895
445	Inference of Quantitative Models of Bacterial Promoters from Time-Series Reporter Gene Data. <i>PLoS Computational Biology</i> , 2015, 11, e1004028.	1.5	38
446	Combined Toxicity of Nano-ZnO and Nano-TiO <sub>2</sub> : From Single- to Multinanomaterial Systems. <i>Environmental Science &amp; Technology</i> , 2015, 49, 8113-8123.	4.6	139
447	The limits of chemosensation vary across dimensions. <i>Nature Communications</i> , 2015, 6, 7468.	5.8	19
448	Bacterial chemotaxis to xenobiotic chemicals and naturally-occurring analogs. <i>Current Opinion in Biotechnology</i> , 2015, 33, 318-326.	3.3	39
449	Investigation of bacterial chemotaxis using a simple three-point microfluidic system. <i>Biochip Journal</i> , 2015, 9, 50-58.	2.5	7
450	An evolutionary link between capsular biogenesis and surface motility in bacteria. <i>Nature Reviews Microbiology</i> , 2015, 13, 318-326.	13.6	16
451	Extracellular ATP inhibits twitching motility-mediated biofilm expansion by <i>Pseudomonas aeruginosa</i> . <i>BMC Microbiology</i> , 2015, 15, 55.	1.3	14
452	Handbook for <i>Azospirillum</i> . , 2015, , .		30
453	Chemotaxis in <i>Azospirillum</i> . , 2015, , 101-114.		7
454	Nutrient-Sensing Mechanisms across Evolution. <i>Cell</i> , 2015, 161, 67-83.	13.5	293
455	The multihued palette of dye-decolorizing peroxidases. <i>Archives of Biochemistry and Biophysics</i> , 2015, 574, 56-65.	1.4	81
456	<i>Archaea</i> on the move. <i>Environmental Microbiology Reports</i> , 2015, 7, 385-387.	1.0	5
457	Relation between chemotaxis and consumption of amino acids in bacteria. <i>Molecular Microbiology</i> , 2015, 96, 1272-1282.	1.2	121
458	Novel Pseudotaxis Mechanisms Improve Migration of Straight-Swimming Bacterial Mutants Through a Porous Environment. <i>MBio</i> , 2015, 6, e00005.	1.8	20
459	Conformational Transitions that Enable Histidine Kinase Autophosphorylation and Receptor Array Integration. <i>Journal of Molecular Biology</i> , 2015, 427, 3890-3907.	2.0	25

#	ARTICLE	IF	CITATIONS
460	Variation of swimming speed enhances the chemotactic migration of <i>Escherichia coli</i> . <i>Systems and Synthetic Biology</i> , 2015, 9, 85-95.	1.0	6
461	Opposite and Coordinated Rotation of Amphitrichous Flagella Governs Oriented Swimming and Reversals in a Magnetotactic <i>Spirillum</i> . <i>Journal of Bacteriology</i> , 2015, 197, 3275-3282.	1.0	47
462	Bacteria-based microrobot for chemotaxis delivery of microcubics. , 2015, , .		0
463	Design and Synthesis of Nonequilibrium Systems. <i>ACS Nano</i> , 2015, 9, 8672-8688.	7.3	128
464	Phobalysin, a Small $\beta$ -Pore-Forming Toxin of <i>Photobacterium damsela</i> subsp. <i>damsela</i> . <i>Infection and Immunity</i> , 2015, 83, 4335-4348.	1.0	40
465	<i>H.Âpylori</i> GPS: Modulating Host Metabolites for Location Sensing. <i>Cell Host and Microbe</i> , 2015, 18, 135-136.	5.1	2
466	More than a locomotive organelle: flagella in <i>Escherichia coli</i> . <i>Applied Microbiology and Biotechnology</i> , 2015, 99, 8883-8890.	1.7	33
467	Type III secretion systems: the bacterial flagellum and the injectisome. <i>Philosophical Transactions of the Royal Society B: Biological Sciences</i> , 2015, 370, 20150020.	1.8	184
468	Memory of Germinant Stimuli in Bacterial Spores. <i>MBio</i> , 2015, 6, e01859-15.	1.8	19
469	Understanding the link between single cell and population scale responses of <i>Escherichia coli</i> in differing ligand gradients. <i>Computational and Structural Biotechnology Journal</i> , 2015, 13, 528-538.	1.9	9
470	The flagellum in bacterial pathogens: For motility and a whole lot more. <i>Seminars in Cell and Developmental Biology</i> , 2015, 46, 91-103.	2.3	275
471	The frequency and duration of <i>Salmonella</i> â€“macrophage adhesion events determines infection efficiency. <i>Philosophical Transactions of the Royal Society B: Biological Sciences</i> , 2015, 370, 20140033.	1.8	23
472	Information integration and multiattribute decision making in non-neuronal organisms. <i>Animal Behaviour</i> , 2015, 100, 44-50.	0.8	52
473	Transport equations for subdiffusion with nonlinear particle interaction. <i>Journal of Theoretical Biology</i> , 2015, 366, 71-83.	0.8	26
474	Expression, refolding, purification and crystallization of the sensory domain of the TlpC chemoreceptor from <i>Helicobacter pylori</i> for structural studies. <i>Protein Expression and Purification</i> , 2015, 107, 29-34.	0.6	11
475	Variation in swimming speed of <i>Escherichia coli</i> in response to attractant. <i>Archives of Microbiology</i> , 2015, 197, 211-222.	1.0	14
476	Comparative genomics of <i>Pseudomonas syringae</i> pathovar <i>tomato</i> reveals novel chemotaxis pathways associated with motility and plant pathogenicity. <i>PeerJ</i> , 2016, 4, e2570.	0.9	19
477	Is it Quantum Sentience or Quantum Consciousness? A Review of Social Behaviours Observed in Primitive and Present-Day Microorganisms. <i>NeuroQuantology</i> , 2016, 14, .	0.1	1

#	ARTICLE	IF	CITATIONS
478	Sister Dehalobacter Genomes Reveal Specialization in Organohalide Respiration and Recent Strain Differentiation Likely Driven by Chlorinated Substrates. <i>Frontiers in Microbiology</i> , 2016, 7, 100.	1.5	18
479	Differential Localization of Chemotactic Signaling Arrays during the Lifecycle of <i>Vibrio parahaemolyticus</i> . <i>Frontiers in Microbiology</i> , 2016, 7, 1767.	1.5	14
480	The Interaction between Plants and Bacteria in the Remediation of Petroleum Hydrocarbons: An Environmental Perspective. <i>Frontiers in Microbiology</i> , 2016, 7, 1836.	1.5	176
481	Direct Correlation between Motile Behavior and Protein Abundance in Single Cells. <i>PLoS Computational Biology</i> , 2016, 12, e1005041.	1.5	60
482	Dose-Response Analysis of Chemotactic Signaling Response in <i>Salmonella typhimurium</i> LT2 upon Exposure to Cysteine / Cystine Redox Pair. <i>PLoS ONE</i> , 2016, 11, e0152815.	1.1	2
483	Comparative Genomic and Phenotypic Characterization of Pathogenic and Non-Pathogenic Strains of <i>Xanthomonas arboricola</i> Reveals Insights into the Infection Process of Bacterial Spot Disease of Stone Fruits. <i>PLoS ONE</i> , 2016, 11, e0161977.	1.1	31
484	Direct sensing and signal transduction during bacterial chemotaxis toward aromatic compounds in <i>Comamonas testosteroni</i> . <i>Molecular Microbiology</i> , 2016, 101, 224-237.	1.2	34
485	Glucose induces delocalization of a flagellar biosynthesis protein from the flagellated pole. <i>Molecular Microbiology</i> , 2016, 101, 795-808.	1.2	25
486	<i>P</i> <sub>H</sub> int1, associated with the <i>G</i> protein $\beta$ subunit <i>PsGPA1</i> , is required for the chemotaxis and pathogenicity of <i>Phytophthora sojae</i> . <i>Molecular Plant Pathology</i> , 2016, 17, 272-285.	2.0	29
487	The <i>Borrelia burgdorferi</i> CheY3 response regulator is essential for chemotaxis and completion of its natural infection cycle. <i>Cellular Microbiology</i> , 2016, 18, 1782-1799.	1.1	30
488	Serine suppresses the motor function of a periplasmic PomB mutation in the <i>Vibrio</i> flagella stator. <i>Genes To Cells</i> , 2016, 21, 505-516.	0.5	10
489	MglC, a Paralog of <i>Myxococcus xanthus</i> GTPase-Activating Protein MglB, Plays a Divergent Role in Motility Regulation. <i>Journal of Bacteriology</i> , 2016, 198, 510-520.	1.0	21
490	Singly Flagellated <i>Pseudomonas aeruginosa</i> Chemotaxes Efficiently by Unbiased Motor Regulation. <i>MBio</i> , 2016, 7, e00013.	1.8	39
491	Transcriptional analysis of degenerate strain <i>Clostridium beijerinckii</i> DG-8052 reveals a pleiotropic response to CaCO <sub>3</sub> -associated recovery of solvent production. <i>Scientific Reports</i> , 2016, 6, 38818.	1.6	12
492	Dynamics of Gradient Sensing and Chemotaxis. , 2016, , 4-9.		1
493	Polar Localization of the Serine Chemoreceptor of <i>Escherichia coli</i> Is Nucleoid Exclusion-Dependent. <i>Biophysical Journal</i> , 2016, 111, 2512-2522.	0.2	22
494	Combined genomic and structural analyses of a cultured magnetotactic bacterium reveals its niche adaptation to a dynamic environment. <i>BMC Genomics</i> , 2016, 17, 726.	1.2	18
495	Chemotaxis for enhanced immobilization of <i>Escherichia coli</i> and <i>Legionella pneumophila</i> on biofunctionalized surfaces of GaAs. <i>Biointerphases</i> , 2016, 11, 021004.	0.6	7

#	ARTICLE	IF	CITATIONS
496	Single-cell twitching chemotaxis in developing biofilms. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, 6532-6537.	3.3	61
497	Azospirillum brasilense Chemotaxis Depends on Two Signaling Pathways Regulating Distinct Motility Parameters. Journal of Bacteriology, 2016, 198, 1764-1772.	1.0	32
498	A Conserved Helicobacter pylori Gene, HP0102, Is Induced Upon Contact With Gastric Cells and Has Multiple Roles in Pathogenicity. Journal of Infectious Diseases, 2016, 214, 196-204.	1.9	3
499	Quorum Sensing Is a Language of Chemical Signals and Plays an Ecological Role in Algal-Bacterial Interactions. Critical Reviews in Plant Sciences, 2016, 35, 81-105.	2.7	141
500	Virulence Mechanisms of Helicobacter pylori: An Overview. , 2016, , 57-87.		1
501	Computational Methodologies for Real-Space Structural Refinement of Large Macromolecular Complexes. Annual Review of Biophysics, 2016, 45, 253-278.	4.5	67
502	Comparative Genomics and Transcriptomics of Organohalide-Respiring Bacteria and Regulation of rdh Gene Transcription. , 2016, , 345-376.		14
503	A Diguanylate Cyclase Acts as a Cell Division Inhibitor in a Two-Step Response to Reductive and Envelope Stresses. MBio, 2016, 7, .	1.8	34
504	<sup>1</sup> H, <sup>13</sup> C and <sup>15</sup> N resonance assignments for the response regulator CheY3 from Rhodospirillum rubrum. Biomolecular NMR Assignments, 2016, 10, 373-378.	0.4	3
505	Microbial Morphology and Motility as Biosignatures for Outer Planet Missions. Astrobiology, 2016, 16, 755-774.	1.5	34
506	Design principles for the analysis and construction of robustly homeostatic biological networks. Journal of Theoretical Biology, 2016, 408, 274-289.	0.8	24
507	Energy Taxation toward Host-Derived Nitrate Supports a Salmonella Pathogenicity Island 1-Independent Mechanism of Invasion. MBio, 2016, 7, .	1.8	47
508	Chemotaxis of artificial microswimmers in active density waves. Physical Review E, 2016, 94, 012613.	0.8	51
509	Bacterial suspensions under flow. European Physical Journal: Special Topics, 2016, 225, 2389-2406.	1.2	26
510	Bacterial Energy Sensor Aer Modulates the Activity of the Chemotaxis Kinase CheA Based on the Redox State of the Flavin Cofactor. Journal of Biological Chemistry, 2016, 291, 25809-25814.	1.6	22
511	Whole genome sequencing revealed host adaptation-focused genomic plasticity of pathogenic Leptospira. Scientific Reports, 2016, 6, 20020.	1.6	86
512	A cyclic di-GMP binding adaptor protein interacts with a chemotaxis methyltransferase to control flagellar motor switching. Science Signaling, 2016, 9, ra102.	1.6	61
513	Structural basis for ligand recognition by a Cache chemosensory domain that mediates carboxylate sensing in Pseudomonas syringae. Scientific Reports, 2016, 6, 35198.	1.6	28

#	ARTICLE	IF	CITATIONS
514	Chitinase producing bacteria with direct algicidal activity on marine diatoms. <i>Scientific Reports</i> , 2016, 6, 21984.	1.6	46
515	Localisation and protein-protein interactions of the <i>Helicobacter pylori</i> taxis sensor TlpD and their connection to metabolic functions. <i>Scientific Reports</i> , 2016, 6, 23582.	1.6	23
516	Influence of Vacuum Cooling on <i>Escherichia coli</i> O157:H7 Infiltration in Fresh Leafy Greens via a Multiphoton-Imaging Approach. <i>Applied and Environmental Microbiology</i> , 2016, 82, 106-115.	1.4	13
517	Magnetotactic bacteria. <i>European Physical Journal: Special Topics</i> , 2016, 225, 2173-2188.	1.2	26
518	Moment-flux models for bacterial chemotaxis in large signal gradients. <i>Journal of Mathematical Biology</i> , 2016, 73, 977-1000.	0.8	10
519	Engineering Hybrid Chemotaxis Receptors in Bacteria. <i>ACS Synthetic Biology</i> , 2016, 5, 989-1001.	1.9	55
520	Theoretical modeling in microscale locomotion. <i>Microfluidics and Nanofluidics</i> , 2016, 20, 1.	1.0	13
521	Effects of 3D geometries on cellular gradient sensing and polarization. <i>Physical Biology</i> , 2016, 13, 036008.	0.8	21
522	Comparative genomic analysis of six new-found integrative conjugative elements (ICEs) in <i>Vibrio alginolyticus</i> . <i>BMC Microbiology</i> , 2016, 16, 79.	1.3	13
523	Laminar flow assisted anisotropic bacteria absorption for chemotaxis delivery of bacteria-attached microparticle. <i>Micro and Nano Systems Letters</i> , 2016, 4, .	1.7	11
524	Evaporation-induced stimulation of bacterial osmoregulation for electrical assessment of cell viability. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, 7059-7064.	3.3	21
525	Chemotaxis signaling systems in model beneficial plant-bacteria associations. <i>Plant Molecular Biology</i> , 2016, 90, 549-559.	2.0	207
526	How <i>Helicobacter pylori</i> senses, targets and interacts with the gastric epithelium. <i>Environmental Microbiology</i> , 2016, 18, 791-806.	1.8	77
527	(Actino)Bacterial "intelligence" using comparative genomics to unravel the information processing capacities of microbes. <i>Current Genetics</i> , 2016, 62, 487-498.	0.8	27
528	The crystal structure of the tandem-PAS sensing domain of <i>Campylobacter jejuni</i> chemoreceptor Tlp1 suggests indirect mechanism of ligand recognition. <i>Journal of Structural Biology</i> , 2016, 194, 205-213.	1.3	26
529	The evolutionary emergence of what we call "emotions". <i>Cognition and Emotion</i> , 2016, 30, 609-620.	1.2	65
530	Hypothetical Protein BB0569 Is Essential for Chemotaxis of the Lyme Disease Spirochete <i>Borrelia burgdorferi</i> . <i>Journal of Bacteriology</i> , 2016, 198, 664-672.	1.0	13
531	Microbial Surface Colonization and Biofilm Development in Marine Environments. <i>Microbiology and Molecular Biology Reviews</i> , 2016, 80, 91-138.	2.9	864

#	ARTICLE	IF	CITATIONS
532	The role of regulation in the origin and synthetic modelling of minimal cognition. <i>BioSystems</i> , 2016, 148, 12-21.	0.9	19
533	Biological regulation: controlling the system from within. <i>Biology and Philosophy</i> , 2016, 31, 237-265.	0.7	91
534	Mechanistic Explanation in Systems Biology: Cellular Networks. <i>British Journal for the Philosophy of Science</i> , 2017, 68, 1-25.	1.4	19
535	Materials learning from life: concepts for active, adaptive and autonomous molecular systems. <i>Chemical Society Reviews</i> , 2017, 46, 5588-5619.	18.7	375
536	<i>Campylobacter jejuni</i> transducer like proteins: Chemotaxis and beyond. <i>Gut Microbes</i> , 2017, 8, 323-334.	4.3	24
537	A Dynamic Model of Immune Responses to Antigen Presentation Predicts Different Regions of Tumor or Pathogen Elimination. <i>Cell Systems</i> , 2017, 4, 231-241.e11.	2.9	59
538	Adaptation of <i>Salmonella enterica</i> Serovar Senftenberg to Linalool and Its Association with Antibiotic Resistance and Environmental Persistence. <i>Applied and Environmental Microbiology</i> , 2017, 83, .	1.4	21
539	Cooperation of two distinct coupling proteins creates chemosensory network connections. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, 2970-2975.	3.3	23
540	Architecture of the Flagellar Switch Complex of <i>Escherichia coli</i> : Conformational Plasticity of FlhG and Implications for Adaptive Remodeling. <i>Journal of Molecular Biology</i> , 2017, 429, 1305-1320.	2.0	28
541	Stability and Conformation of a Chemoreceptor HAMP Domain Chimera Correlates with Signaling Properties. <i>Biophysical Journal</i> , 2017, 112, 1383-1395.	0.2	8
542	Methyl-accepting chemotaxis proteins: a core sensing element in prokaryotes and archaea. <i>Cellular and Molecular Life Sciences</i> , 2017, 74, 3293-3303.	2.4	135
543	Inactivation of ferric uptake regulator (Fur) attenuates <i>Helicobacter pylori</i> J99 motility by disturbing the flagellar motor switch and autoinducer-2 production. <i>Helicobacter</i> , 2017, 22, e12388.	1.6	13
544	<i>Euglena</i> : Biochemistry, Cell and Molecular Biology. <i>Advances in Experimental Medicine and Biology</i> , 2017, . .	0.8	15
545	Progress and Potential of Electron Cryotomography as Illustrated by Its Application to Bacterial Chemoreceptor Arrays. <i>Annual Review of Biophysics</i> , 2017, 46, 1-21.	4.5	23
546	Photomovement in <i>Euglena</i> . <i>Advances in Experimental Medicine and Biology</i> , 2017, 979, 207-235.	0.8	22
547	Gravitaxis in <i>Euglena</i> . <i>Advances in Experimental Medicine and Biology</i> , 2017, 979, 237-266.	0.8	17
548	Identification of chemotaxis operon cheYZA and cheA gene expression under stressful conditions in <i>Piscirickettsia salmonis</i> . <i>Microbial Pathogenesis</i> , 2017, 107, 436-441.	1.3	19
549	Distinct Domains of CheA Confer Unique Functions in Chemotaxis and Cell Length in <i>Azospirillum brasilense</i> Sp7. <i>Journal of Bacteriology</i> , 2017, 199, .	1.0	13

#	ARTICLE	IF	CITATIONS
550	Class III Histidine Kinases: a Recently Accessorized Kinase Domain in Putative Modulators of Type IV Pilus-Based Motility. <i>Journal of Bacteriology</i> , 2017, 199, .	1.0	14
551	Chemotaxis and autochemotaxis of self-propelling droplet swimmers. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, 5089-5094.	3.3	196
552	Microbial community function in the bleaching disease of the marine macroalgae <i>Delisea pulchra</i> . <i>Environmental Microbiology</i> , 2017, 19, 3012-3024.	1.8	42
554	Virus interactions: cooperation or competition?. <i>Future Microbiology</i> , 2017, 12, 561-564.	1.0	6
555	Biogenesis of the Flagellar Switch Complex in <i>Escherichia coli</i> : Formation of Sub-Complexes Independently of the Basal-Body MS-Ring. <i>Journal of Molecular Biology</i> , 2017, 429, 2353-2359.	2.0	7
556	Propulsion and Chemotaxis in Bacteria-Driven Microswimmers. <i>Advanced Science</i> , 2017, 4, 1700109.	5.6	66
557	Microorganisms and Their Response to Stimuli. , 2017, , 171-206.		0
558	Bacterial Signatures of Red-Operculum Disease in the Gut of Crucian Carp ( <i>Carassius auratus</i> ). <i>Microbial Ecology</i> , 2017, 74, 510-521.	1.4	112
559	Bacterial Unculturability and the Formation of Intercellular Metabolic Networks. <i>Trends in Microbiology</i> , 2017, 25, 349-361.	3.5	188
560	Defining motility in the Staphylococci. <i>Cellular and Molecular Life Sciences</i> , 2017, 74, 2943-2958.	2.4	55
561	Torque Generation in the Bacterial Flagellar Motor. <i>Biophysical Journal</i> , 2017, 112, 30a.	0.2	0
562	Is there any crosstalk between the chemotaxis and virulence induction signaling in <i>Agrobacterium tumefaciens</i> ?. <i>Biotechnology Advances</i> , 2017, 35, 505-511.	6.0	32
563	Direct Imaging of Intracellular Signaling Molecule Responsible for the Bacterial Chemotaxis. <i>Methods in Molecular Biology</i> , 2017, 1593, 215-226.	0.4	0
564	Reconstructing the genotype-to-fitness map for the bacterial chemotaxis network and its emergent behavioural phenotypes. <i>Journal of Theoretical Biology</i> , 2017, 420, 200-212.	0.8	0
565	Characterization of Ligand-Receptor Interactions: Chemotaxis, Biofilm, Cell Culture Assays, and Animal Model Methodologies. <i>Methods in Molecular Biology</i> , 2017, 1512, 149-161.	0.4	6
566	The Master Regulators of the Fla1 and Fla2 Flagella of <i>Rhodobacter sphaeroides</i> Control the Expression of Their Cognate CheY Proteins. <i>Journal of Bacteriology</i> , 2017, 199, .	1.0	10
567	Sensory Repertoire of Bacterial Chemoreceptors. <i>Microbiology and Molecular Biology Reviews</i> , 2017, 81, .	2.9	158
568	Light-controlled motility in prokaryotes and the problem of directional light perception. <i>FEMS Microbiology Reviews</i> , 2017, 41, 900-922.	3.9	62



#	ARTICLE	IF	CITATIONS
569	Molecular architecture of the sheathed polar flagellum in <i>Vibrio alginolyticus</i> . Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 10966-10971.	3.3	87
570	Merging orthogonal microfluidic flows to generate multi-profile concentration gradients. RSC Advances, 2017, 7, 45513-45520.	1.7	1
571	Helicobacter pylori chemoreceptor TlpC mediates chemotaxis to lactate. Scientific Reports, 2017, 7, 14089.	1.6	56
572	Cell-cell communication enhances bacterial chemotaxis toward external attractants. Scientific Reports, 2017, 7, 12855.	1.6	21
573	Outer Membrane Protein OmpB Methylation May Mediate Bacterial Virulence. Trends in Biochemical Sciences, 2017, 42, 936-945.	3.7	8
574	Microemulsion-Based Soft Bacteria-Driven Microswimmers for Active Cargo Delivery. ACS Nano, 2017, 11, 9759-9769.	7.3	157
575	Modeling of active swimmer suspensions and their interactions with the environment. Soft Matter, 2017, 13, 6033-6050.	1.2	20
576	Distinguishing advective and powered motion in self-propelled colloids. Journal of Physics Condensed Matter, 2017, 29, 445101.	0.7	5
577	Osmotaxis in <i>Escherichia coli</i> through changes in motor speed. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, E7969-E7976.	3.3	30
578	Hybrid BioMicromotors. Applied Physics Reviews, 2017, 4, .	5.5	100
579	Morphologies of <i>Bacillus subtilis</i> communities responding to environmental variation. Development Growth and Differentiation, 2017, 59, 369-378.	0.6	23
580	Self-Polarizing Microswimmers in Active Density Waves. Scientific Reports, 2017, 7, 41884.	1.6	36
581	Phototaxis beyond turning: persistent accumulation and response acclimation of the microalga <i>Chlamydomonas reinhardtii</i> . Scientific Reports, 2017, 7, 3447.	1.6	44
582	The biophysicist's guide to the bacterial flagellar motor. Advances in Physics: X, 2017, 2, 324-343.	1.5	22
583	Real-Time Imaging of Single-Molecule Enzyme Cascade Using a DNA Origami Raft. Journal of the American Chemical Society, 2017, 139, 17525-17532.	6.6	100
584	Assigning chemoreceptors to chemosensory pathways in <i>Pseudomonas aeruginosa</i> . Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 12809-12814.	3.3	72
585	Essential Role of the Cytoplasmic Chemoreceptor TlpT in the <i>De Novo</i> Formation of Chemosensory Complexes in <i>Rhodobacter sphaeroides</i> . Journal of Bacteriology, 2017, 199, .	1.0	7
586	<i>Borrelia burgdorferi</i> CheY2 Is Dispensable for Chemotaxis or Motility but Crucial for the Infectious Life Cycle of the Spirochete. Infection and Immunity, 2017, 85, .	1.0	15

#	ARTICLE	IF	CITATIONS
587	Catch me if you can: dispersal and foraging of <i>Bdellovibrio bacteriovorus</i> 109J along mycelia. ISME Journal, 2017, 11, 386-393.	4.4	36
588	Adhesion of bacteria to surfaces and biofilm formation on medical devices. , 2017, , 47-95.		20
589	Campylobacter jejuni. Methods in Molecular Biology, 2017, , .	0.4	2
590	Statistical signatures of a targeted search by bacteria. Physical Biology, 2017, 14, 065002.	0.8	0
591	Comparative genomics of the genus Desulfitobacterium. FEMS Microbiology Ecology, 2017, 93, .	1.3	27
592	Evaluation of the oral microbiome as a biomarker for early detection of human oral carcinomas. , 2017, , .		2
593	Insight into the evolution of microbial metabolism from the deep-branching bacterium, Thermovibrio ammonificans. ELife, 2017, 6, .	2.8	40
594	Sustaining Rare Marine Microorganisms: Macroorganisms As Repositories and Dispersal Agents of Microbial Diversity. Frontiers in Microbiology, 2017, 8, 947.	1.5	66
595	Mutation in flrA and mshA Genes of Vibrio cholerae Inversely Involved in vps-Independent Biofilm Driving Bacterium Toward Nutrients in Lake Water. Frontiers in Microbiology, 2017, 8, 1770.	1.5	17
596	Comparative Metagenomics Reveals the Distinctive Adaptive Features of the Spongia officinalis Endosymbiotic Consortium. Frontiers in Microbiology, 2017, 8, 2499.	1.5	51
597	Phenotypic diversity and temporal variability in a bacterial signaling network revealed by single-cell FRET. ELife, 2017, 6, .	2.8	58
598	Taxis of Artificial Swimmers in a Spatio-Temporally Modulated Activation Medium. Entropy, 2017, 19, 97.	1.1	17
599	FRET Analysis of the Chemotaxis Pathway Response. Methods in Molecular Biology, 2018, 1729, 107-126.	0.4	3
600	Antibiotic Stimulation of a Bacillus subtilis Migratory Response. MSphere, 2018, 3, .	1.3	35
601	A Static Microfluidic Device for Investigating the Chemotaxis Response to Stable, Non-linear Gradients. Methods in Molecular Biology, 2018, 1729, 47-59.	0.4	1
602	Mathematical Analysis of the Escherichia coli Chemotaxis Signalling Pathway. Bulletin of Mathematical Biology, 2018, 80, 758-787.	0.9	5
603	Genomes of ubiquitous marine and hypersaline <i>Hydrogenovibrio</i> , <i>Thiomicrothabodus</i> and <i>Thiomicrospira</i> spp. encode a diversity of mechanisms to sustain chemolithoautotrophy in heterogeneous environments. Environmental Microbiology, 2018, 20, 2686-2708.	1.8	32
604	Regulated Stochasticity in a Bacterial Signaling Network Permits Tolerance to a Rapid Environmental Change. Cell, 2018, 173, 196-207.e14.	13.5	61

#	ARTICLE	IF	CITATIONS
605	Regulatory Role of an Interdomain Linker in the Bacterial Chemotaxis Histidine Kinase CheA. <i>Journal of Bacteriology</i> , 2018, 200, .	1.0	12
606	A Chemotaxis-Like Pathway of <i>Azorhizobium caulinodans</i> Controls Flagella-Driven Motility, Which Regulates Biofilm Formation, Exopolysaccharide Biosynthesis, and Competitive Nodulation. <i>Molecular Plant-Microbe Interactions</i> , 2018, 31, 737-749.	1.4	37
607	Screening Chemoreceptor-Ligand Interactions by High-Throughput Thermal-Shift Assays. <i>Methods in Molecular Biology</i> , 2018, 1729, 281-290.	0.4	14
608	Two Spatial Chemotaxis Assays: The Nutrient-Depleted Chemotaxis Assay and the Agarose-Plug-Bridge Assay. <i>Methods in Molecular Biology</i> , 2018, 1729, 23-31.	0.4	4
609	Cellular Stoichiometry of Methyl-Accepting Chemotaxis Proteins in <i>Sinorhizobium meliloti</i> . <i>Journal of Bacteriology</i> , 2018, 200, .	1.0	21
610	Expression of the arsenite oxidation regulatory operon in <i>Rhizobium</i> sp. str. NT-26 is under the control of two promoters that respond to different environmental cues. <i>MicrobiologyOpen</i> , 2018, 7, e00567.	1.2	9
611	Multiple intrainestinal signals coordinate the regulation of <i>Vibrio cholerae</i> virulence determinants. <i>Pathogens and Disease</i> , 2018, 76, .	0.8	28
612	Self-Propelled Micro/Nanoparticle Motors. <i>Particle and Particle Systems Characterization</i> , 2018, 35, 1700382.	1.2	76
613	Perspective: Maximum caliber is a general variational principle for dynamical systems. <i>Journal of Chemical Physics</i> , 2018, 148, 010901.	1.2	68
614	Association Between Loss of Type IV Pilus Synthesis Ability and Phenotypic Variation in the Cucurbit Pathogenic Bacterium <i>Acidovorax citrulli</i> . <i>Molecular Plant-Microbe Interactions</i> , 2018, 31, 548-559.	1.4	19
615	Boolean-chemotaxis of logibots deciphering the motions of self-propelling microorganisms. <i>Soft Matter</i> , 2018, 14, 3182-3191.	1.2	5
616	Protein Acetylation and Butyrylation Regulate the Phenotype and Metabolic Shifts of the Endospore-forming <i>Clostridium acetobutylicum</i> . <i>Molecular and Cellular Proteomics</i> , 2018, 17, 1156-1169.	2.5	38
617	Numerical study of the effect of soft layer properties on bacterial electroporation. <i>Bioelectrochemistry</i> , 2018, 123, 261-272.	2.4	12
618	Comparative proteomic and physiological analyses reveal the role of zinc on <i>Arthrospira platensis</i> response to low-temperature stress. <i>Journal of Applied Phycology</i> , 2018, 30, 1005-1017.	1.5	2
619	Advances in development of new tools for the study of phosphohistidine. <i>Laboratory Investigation</i> , 2018, 98, 291-303.	1.7	36
620	Lighting up my life: a LOV-based fluorescent reporter for <i>Campylobacter jejuni</i> . <i>Research in Microbiology</i> , 2018, 169, 108-114.	1.0	9
621	Comparative Genomics of Myxobacterial Chemosensory Systems. <i>Journal of Bacteriology</i> , 2018, 200, .	1.0	18
622	Quorum-Sensing Systems as Targets for Antivirulence Therapy. <i>Trends in Microbiology</i> , 2018, 26, 313-328.	3.5	351

#	ARTICLE	IF	CITATIONS
623	Quantitative chemical biosensing by bacterial chemotaxis in microfluidic chips. <i>Environmental Microbiology</i> , 2018, 20, 241-258.	1.8	31
624	Characterization of dominant giant rod-shaped magnetotactic bacteria from a low tide zone of the China Sea. <i>Journal of Oceanology and Limnology</i> , 2018, 36, 783-794.	0.6	4
625	Sciences of Observation. <i>Philosophies</i> , 2018, 3, 29.	0.4	4
626	Cytotoxin- and Chemotaxis-Genes Cooperate to Promote Adhesion of <i>Photobacterium damsela</i> subsp. <i>damsela</i> . <i>Frontiers in Microbiology</i> , 2018, 9, 2996.	1.5	12
627	Microbial Functional Responses to Cholesterol Catabolism in Denitrifying Sludge. <i>MSystems</i> , 2018, 3, .	1.7	12
628	Synapse molecular complexity and the plasticity behaviour problem. <i>Brain and Neuroscience Advances</i> , 2018, 2, 239821281881068.	1.8	15
629	Sugarcane apoplast fluid modulates the global transcriptional profile of the diazotrophic bacteria <i>Paraburkholderia tropica</i> strain Ppe8. <i>PLoS ONE</i> , 2018, 13, e0207863.	1.1	9
630	Phototaxis in a wild isolate of the cyanobacterium <i>Synechococcus elongatus</i> . <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2018, 115, E12378-E12387.	3.3	61
631	Nutrient Transport Driven by Microbial Active Carpets. <i>Physical Review Letters</i> , 2018, 121, 248101.	2.9	33
632	Flagellar number governs bacterial spreading and transport efficiency. <i>Science Advances</i> , 2018, 4, eaar6425.	4.7	31
633	Chemotaxis Behavior of <i>Pseudomonas</i> Species and Biodegradation of Pollutants. <i>Sustainable Agriculture Reviews</i> , 2018, , 483-507.	0.6	3
634	Benchmarking the communication fidelity of biomolecular signaling cascades featuring pseudo-one-dimensional transport. <i>AIP Advances</i> , 2018, 8, .	0.6	2
635	Hybrid Centralized/Decentralized Control of Bacteria-Based Bio-Hybrid Microrobots. , 2018, , .		2
636	In silico characterization of a novel putative aerotaxis chemosensory system in the myxobacterium, <i>Coralloccoccus coralloides</i> . <i>BMC Genomics</i> , 2018, 19, 757.	1.2	3
637	The alternative sigma factor RpoQ regulates colony morphology, biofilm formation and motility in the fish pathogen <i>Aliivibrio salmonicida</i> . <i>BMC Microbiology</i> , 2018, 18, 116.	1.3	5
638	Hook length of the bacterial flagellum is optimized for maximal stability of the flagellar bundle. <i>PLoS Biology</i> , 2018, 16, e2006989.	2.6	31
639	Identification of potential antibiotic targets in the proteome of multi-drug resistant <i>Proteus mirabilis</i> . <i>Meta Gene</i> , 2018, 18, 167-173.	0.3	11
641	Modeling the odor-landscape resulting from the pumping behavior of bivalve clams in the presence of predators. <i>Journal of Theoretical Biology</i> , 2018, 453, 40-47.	0.8	2

#	ARTICLE	IF	CITATIONS
642	<i>Burkholderia</i> bacteria use chemotaxis to find social amoeba <i>Dictyostelium discoideum</i> hosts. ISME Journal, 2018, 12, 1977-1993.	4.4	41
643	Ecology and evolution of metabolic cross-feeding interactions in bacteria. Natural Product Reports, 2018, 35, 455-488.	5.2	322
644	Scaling up molecular pattern recognition with DNA-based winner-take-all neural networks. Nature, 2018, 559, 370-376.	13.7	338
645	Bacterial colonies as complex adaptive systems. Natural Computing, 2018, 17, 781-798.	1.8	4
646	<i>Treponema denticola</i> transcriptional profiles in serum-restricted conditions. FEMS Microbiology Letters, 2018, 365, .	0.7	7
647	Gravitaxis in Flagellates and Ciliates. SpringerBriefs in Space Life Sciences, 2018, , 27-45.	0.1	2
648	Gravity Sensing, Graviorientation and Microgravity. SpringerBriefs in Space Life Sciences, 2018, , 1-11.	0.1	2
649	<i>Xanthomonas oryzae</i> pv. <i>oryzae</i> chemotaxis components and chemoreceptor Mcp2 are involved in the sensing of constituents of xylem sap and contribute to the regulation of virulence-associated functions and entry into rice. Molecular Plant Pathology, 2018, 19, 2397-2415.	2.0	41
650	Getting Bacteria in Shape: Synthetic Morphology Approaches for the Design of Efficient Microbial Cell Factories. Advanced Biology, 2018, 2, 1800111.	3.0	46
651	Chemotaxis of <i>Escherichia coli</i> to major hormones and polyamines present in human gut. ISME Journal, 2018, 12, 2736-2747.	4.4	62
652	Function and Regulation of <i>Agrobacterium tumefaciens</i> Cell Surface Structures that Promote Attachment. Current Topics in Microbiology and Immunology, 2018, 418, 143-184.	0.7	36
653	Gravitational Biology I. SpringerBriefs in Space Life Sciences, 2018, , .	0.1	20
654	Logistic Regression of Ligands of Chemotaxis Receptors Offers Clues about Their Recognition by Bacteria. Frontiers in Bioengineering and Biotechnology, 2018, 5, 88.	2.0	1
655	Strategies of Explanatory Abstraction in Molecular Systems Biology. Philosophy of Science, 2018, 85, 955-968.	0.5	3
656	Whole-genome sequencing and comparative analysis of two plant-associated strains of <i>Rhodopseudomonas palustris</i> (PS3 and YSC3). Scientific Reports, 2018, 8, 12769.	1.6	32
657	Effective harvesting of the marine microalga <i>Thalassiosira pseudonana</i> by <i>Marinobacter</i> sp. FL06. Bioresource Technology, 2018, 269, 127-133.	4.8	14
658	Combined influence of hydrodynamics and chemotaxis in the distribution of microorganisms around spherical nutrient sources. Physical Review E, 2018, 98, 012419.	0.8	9
659	Metabolomics and Transcriptomics Identify Multiple Downstream Targets of <i>Paraburkholderia phymatum</i> If54 During Symbiosis with <i>Phaseolus vulgaris</i> . International Journal of Molecular Sciences, 2018, 19, 1049.	1.8	11

#	ARTICLE	IF	CITATIONS
660	DNA molecules deviate from shortest trajectory when driven through hydrogel. <i>Journal of Chemical Physics</i> , 2018, 149, 163331.	1.2	6
661	Novel Role of VisP and the Wzz System during O-Antigen Assembly in <i>Salmonella enterica</i> Serovar Typhimurium Pathogenesis. <i>Infection and Immunity</i> , 2018, 86, .	1.0	6
662	Decoding the chemotactic signal. <i>Journal of Leukocyte Biology</i> , 2018, 104, 359-374.	1.5	28
663	Dispersal-competition tradeoff in microbiomes in the quest for land colonization. <i>Scientific Reports</i> , 2018, 8, 9451.	1.6	15
664	Mathematical models for chemotaxis and their applications in self-organisation phenomena. <i>Journal of Theoretical Biology</i> , 2019, 481, 162-182.	0.8	82
665	Transient Anomalous Diffusion in Run-and-Tumble Dynamics. <i>Frontiers in Physics</i> , 2019, 7, .	1.0	19
666	Metabolomics for Investigating Physiological and Pathophysiological Processes. <i>Physiological Reviews</i> , 2019, 99, 1819-1875.	13.1	516
667	Regulation of flagellar motor switching by c-di-GMP phosphodiesterases in <i>Pseudomonas aeruginosa</i> . <i>Journal of Biological Chemistry</i> , 2019, 294, 13789-13799.	1.6	20
668	Quenching active swarms: effects of light exposure on collective motility in swarming <i>Serratia marcescens</i> . <i>Journal of the Royal Society Interface</i> , 2019, 16, 20180960.	1.5	19
669	Bose-Einstein-like condensation in scalar active matter with diffusivity edge. <i>Physical Review E</i> , 2019, 100, 010601.	0.8	10
670	Insights into the transcriptomic response of the plant engineering bacterium <i>Ensifer adhaerens</i> OV14 during transformation. <i>Scientific Reports</i> , 2019, 9, 10344.	1.6	5
671	A Mechanism of Synaptic Clock Underlying Subjective Time Perception. <i>Frontiers in Neuroscience</i> , 2019, 13, 716.	1.4	0
672	Motile curved bacteria are Pareto-optimal. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019, 116, 14440-14447.	3.3	49
673	Active Phase Separation in Mixtures of Chemically Interacting Particles. <i>Physical Review Letters</i> , 2019, 123, 018101.	2.9	91
674	Mechanism of Signalling and Adaptation through the <i>Rhodobacter sphaeroides</i> Cytoplasmic Chemoreceptor Cluster. <i>International Journal of Molecular Sciences</i> , 2019, 20, 5095.	1.8	9
675	A Light-Driven Microgel Rotor. <i>Small</i> , 2019, 15, e1903379.	5.2	32
676	Thrust and Power Output of the Bacterial Flagellar Motor: A Micromagnetic Tweezers Approach. <i>Biophysical Journal</i> , 2019, 117, 1250-1257.	0.2	6
677	Interrogating the Transient Selectivity of Bacterial Chemotaxis-Driven Affinity and Accumulation of Carbonaceous Substances via Raman Microspectroscopy. <i>Frontiers in Microbiology</i> , 2019, 10, 2215.	1.5	6

#	ARTICLE	IF	CITATIONS
678	Dynamic Behaviour in Microcompartments. Chemistry - A European Journal, 2019, 25, 16440-16450.	1.7	9
679	Genome-centered omics insight into the competition and niche differentiation of <i>Ca. Jettenia</i> and <i>Ca. Brocadia</i> affiliated to anammox bacteria. Applied Microbiology and Biotechnology, 2019, 103, 8191-8202.	1.7	24
680	Enzymes for Aerobic Degradation of Alkanes in Bacteria. , 2019, , 117-142.		8
681	Identification of in vivo Essential Genes of <i>Vibrio vulnificus</i> for Establishment of Wound Infection by Signature-Tagged Mutagenesis. Frontiers in Microbiology, 2019, 10, 123.	1.5	12
682	Adaptive Responses of <i>Shewanella decolorationis</i> to Toxic Organic Extracellular Electron Acceptor Azo Dyes in Anaerobic Respiration. Applied and Environmental Microbiology, 2019, 85, .	1.4	20
683	Adjustment in tumbling rates improves bacterial chemotaxis on obstacle-laden terrains. Proceedings of the National Academy of Sciences of the United States of America, 2019, 116, 11770-11775.	3.3	12
684	Bacteria Floc, but Do They Flock? Insights from Population Interaction Models of Quorum Sensing. MBio, 2019, 10, .	1.8	5
685	Chemotaxis Towards Aromatic Compounds: Insights from <i>Comamonas testosteroni</i> . International Journal of Molecular Sciences, 2019, 20, 2701.	1.8	22
686	The Two Chemotaxis Clusters in <i>Caulobacter crescentus</i> Play Different Roles in Chemotaxis and Biofilm Regulation. Journal of Bacteriology, 2019, 201, .	1.0	19
687	Bacteria push the limits of chemotactic precision to navigate dynamic chemical gradients. Proceedings of the National Academy of Sciences of the United States of America, 2019, 116, 10792-10797.	3.3	41
688	Blended Cognition: The Robotic Challenge. Springer Series in Cognitive and Neural Systems, 2019, , 3-21.	0.1	2
689	Bacterial chemotaxis in a microfluidic T-maze reveals strong phenotypic heterogeneity in chemotactic sensitivity. Nature Communications, 2019, 10, 1877.	5.8	74
690	<i>In Situ</i> Structures of Polar and Lateral Flagella Revealed by Cryo-Electron Tomography. Journal of Bacteriology, 2019, 201, .	1.0	34
691	Genomic characterization of <i>Kerstersia gyiorum</i> SWMUKG01, an isolate from a patient with respiratory infection in China. PLoS ONE, 2019, 14, e0214686.	1.1	3
692	Benefits of a <i>Bacillus</i> probiotic to larval fish survival and transport stress resistance. Scientific Reports, 2019, 9, 4892.	1.6	59
693	Multi-omics response of <i>Pannonibacter phragmitetus</i> BB to hexavalent chromium. Environmental Pollution, 2019, 249, 63-73.	3.7	65
694	A bacterial based distributed gradient descent model for mass scale evacuations. Swarm and Evolutionary Computation, 2019, 46, 97-103.	4.5	3
695	Cross Talk between Chemosensory Pathways That Modulate Chemotaxis and Biofilm Formation. MBio, 2019, 10, .	1.8	49

#	ARTICLE	IF	CITATIONS
696	Receptor crosstalk improves concentration sensing of multiple ligands. <i>Physical Review E</i> , 2019, 99, 022423.	0.8	24
697	Species-specific enhancement of enterohemorrhagic <i>E. coli</i> pathogenesis mediated by microbiome metabolites. <i>Microbiome</i> , 2019, 7, 43.	4.9	102
698	The role of microbial motility and chemotaxis in symbiosis. <i>Nature Reviews Microbiology</i> , 2019, 17, 284-294.	13.6	160
699	Colloid Transport in Porous Media: A Review of Classical Mechanisms and Emerging Topics. <i>Transport in Porous Media</i> , 2019, 130, 129-156.	1.2	26
700	Probing chemotaxis activity in <i>Escherichia coli</i> using fluorescent protein fusions. <i>Scientific Reports</i> , 2019, 9, 3845.	1.6	6
701	A multi-mode digital holographic microscope. <i>Review of Scientific Instruments</i> , 2019, 90, 023705.	0.6	12
702	Hybrid centralized/decentralized control of a network of bacteria-based bio-hybrid microrobots. <i>Journal of Micro-Bio Robotics</i> , 2019, 15, 1-12.	2.1	6
703	The Corporate Permeation Index – A tool to study the macrosocial determinants of Non-Communicable Disease. <i>SSM - Population Health</i> , 2019, 7, 100361.	1.3	26
704	Multiple CheY Homologs Control Swimming Reversals and Transient Pauses in <i>Azospirillum brasilense</i> . <i>Biophysical Journal</i> , 2019, 116, 1527-1537.	0.2	16
705	A Dual Role of Amino Acids from <i>Sesbania rostrata</i> Seed Exudates in the Chemotaxis Response of <i>Azorhizobium caulinodans</i> ORS571. <i>Molecular Plant-Microbe Interactions</i> , 2019, 32, 1134-1147.	1.4	14
706	A PilZ-Containing Chemotaxis Receptor Mediates Oxygen and Wheat Root Sensing in <i>Azospirillum brasilense</i> . <i>Frontiers in Microbiology</i> , 2019, 10, 312.	1.5	12
707	Identification of Cbp1, a c-di-GMP Binding Chemoreceptor in <i>Azorhizobium caulinodans</i> ORS571 Involved in Chemotaxis and Nodulation of the Host Plant. <i>Frontiers in Microbiology</i> , 2019, 10, 638.	1.5	9
708	Cell-cell communication, chemotaxis and recruitment in <i>Vibrio parahaemolyticus</i> . <i>Molecular Microbiology</i> , 2019, 112, 99-113.	1.2	6
709	Flagellum-mediated motility in <i>Pelotomaculum thermopropionicum</i> SI. <i>Bioscience, Biotechnology and Biochemistry</i> , 2019, 83, 1362-1371.	0.6	5
710	Targeted drug delivery technology using untethered microrobots: a review. <i>Journal of Micromechanics and Microengineering</i> , 2019, 29, 053002.	1.5	78
711	Underlying mechanisms of ANAMMOX bacteria adaptation to salinity stress. <i>Journal of Industrial Microbiology and Biotechnology</i> , 2019, 46, 573-585.	1.4	37
712	Blocks in Tricarboxylic Acid Cycle of <i>Salmonella enterica</i> Cause Global Perturbation of Carbon Storage, Motility, and Host-Pathogen Interaction. <i>MSphere</i> , 2019, 4, .	1.3	5
713	Rise of cyborg microrobot: different story for different configuration. <i>IET Nanobiotechnology</i> , 2019, 13, 651-664.	1.9	9



#	ARTICLE	IF	CITATIONS
714	Hybrid Two-Component Sensors for Identification of Bacterial Chemoreceptor Function. <i>Applied and Environmental Microbiology</i> , 2019, 85, .	1.4	12
715	Chemoperception of Specific Amino Acids Controls Phytopathogenicity in <i>Pseudomonas syringae</i> pv. tomato. <i>MBio</i> , 2019, 10, .	1.8	31
716	Universal aspects of collective behavior in chemotactic systems. <i>Physical Review E</i> , 2019, 100, 032609.	0.8	5
717	Carboxylic Ester Hydrolases in Bacteria: Active Site, Structure, Function and Application. <i>Crystals</i> , 2019, 9, 597.	1.0	24
718	Sensing and Approaching Toxic Arsenate by <i>Shewanella putrefaciens</i> CN-32. <i>Environmental Science &amp; Technology</i> , 2019, 53, 14604-14611.	4.6	12
719	Single Nanoparticle Tracking Reveals Efficient Long-Distance Undercurrent Transport in Upper Fluid of Bacterial Swarms. <i>IScience</i> , 2019, 22, 123-132.	1.9	12
720	The gut microbiota: a new perspective on the toxicity of malachite green (MG). <i>Applied Microbiology and Biotechnology</i> , 2019, 103, 9723-9737.	1.7	12
721	Bacterial chemotaxis coupling protein: Structure, function and diversity. <i>Microbiological Research</i> , 2019, 219, 40-48.	2.5	52
722	Organization of the Flagellar Switch Complex of <i>Bacillus subtilis</i> . <i>Journal of Bacteriology</i> , 2019, 201, .	1.0	18
723	Swimming with magnets: From biological organisms to synthetic devices. <i>Physics Reports</i> , 2019, 789, 1-54.	10.3	57
724	Efficiency of the flagellar propulsion of <i>Escherichia coli</i> in confined microfluidic geometries. <i>Physical Review E</i> , 2019, 99, 012408.	0.8	7
725	Design of Farm Assessment Index (FAI) for a holistic comparison of farming practices: case of organic and conventional farming systems from two Indian states. <i>Agroecology and Sustainable Food Systems</i> , 2019, 43, 329-357.	1.0	7
726	Juxtaposed membranes underpin cellular adhesion and display unilateral cell division of multicellular magnetotactic prokaryotes. <i>Environmental Microbiology</i> , 2020, 22, 1481-1494.	1.8	25
727	Coupling Between Colloidal Assemblies Can Drive a Bistable to Oscillatory Transition. <i>ChemSystemsChem</i> , 2020, 2, e1900036.	1.1	2
728	Regulation of the chemotaxis histidine kinase CheA: A structural perspective. <i>Biochimica Et Biophysica Acta - Biomembranes</i> , 2020, 1862, 183030.	1.4	45
729	Diversity of Bacterial Chemosensory Arrays. <i>Trends in Microbiology</i> , 2020, 28, 68-80.	3.5	32
730	Bridging the Gap Between Single-Strain and Community-Level Plant-Microbe Chemical Interactions. <i>Molecular Plant-Microbe Interactions</i> , 2020, 33, 124-134.	1.4	45
731	iTRAQ-based proteomic analyses of the plant-pathogenic bacterium <i>Acidovorax citrulli</i> during entrance into and resuscitation from the viable but nonculturable state. <i>Journal of Proteomics</i> , 2020, 211, 103547.	1.2	13

#	ARTICLE	IF	CITATIONS
732	Structure and dynamics of the E. coli chemotaxis core signaling complex by cryo-electron tomography and molecular simulations. <i>Communications Biology</i> , 2020, 3, 24.	2.0	35
733	Is Graphene Oxide a Chemoattractant?. <i>Nano Letters</i> , 2020, 20, 1455-1460.	4.5	13
734	Broad Specificity of Amino Acid Chemoreceptor CtaA of <i>Pseudomonas fluorescens</i> Is Afforded by Plasticity of Its Amphipathic Ligand-Binding Pocket. <i>Molecular Plant-Microbe Interactions</i> , 2020, 33, 612-623.	1.4	12
735	Modelling bacterial chemotaxis for indirectly binding attractants. <i>Journal of Theoretical Biology</i> , 2020, 487, 110120.	0.8	2
736	Magnetoreception in Microorganisms. <i>Trends in Microbiology</i> , 2020, 28, 266-275.	3.5	35
737	MiST 3.0: an updated microbial signal transduction database with an emphasis on chemosensory systems. <i>Nucleic Acids Research</i> , 2020, 48, D459-D464.	6.5	129
738	Chemotaxis and cyclic-di-GMP signalling control surface attachment of <i>Escherichia coli</i> . <i>Molecular Microbiology</i> , 2020, 113, 728-739.	1.2	33
739	Measuring the urban sustainable development in cities through a Composite Index: The case of Portugal. <i>Sustainable Development</i> , 2020, 28, 507-520.	6.9	45
740	Green Synthesis of Nanoparticles: Applications and Prospects. , 2020, , .		4
741	All living cells are cognitive. <i>Biochemical and Biophysical Research Communications</i> , 2021, 564, 134-149.	1.0	25
742	Dual transcriptomics and proteomics analyses of the early stage of interaction between <i>Caballeronia mineralivorans</i> PML1 (12) and mineral. <i>Environmental Microbiology</i> , 2020, 22, 3838-3862.	1.8	10
743	Assessing the sustainability dimension at local scale: Case study of Spanish cities. <i>Ecological Indicators</i> , 2020, 117, 106687.	2.6	28
744	Apparent phototaxis enabled by Brownian motion. <i>Soft Matter</i> , 2020, 16, 10585-10590.	1.2	15
745	Genetic factors involved in rhizosphere colonization by phytobeneficial <i>Pseudomonas</i> spp.. <i>Computational and Structural Biotechnology Journal</i> , 2020, 18, 3539-3554.	1.9	64
746	Fluctuations in Intracellular CheY-P Concentration Coordinate Reversals of Flagellar Motors in E. coli. <i>Biomolecules</i> , 2020, 10, 1544.	1.8	8
747	The phosphorylated regulator of chemotaxis is crucial throughout biofilm biogenesis in <i>Shewanella oneidensis</i> . <i>Npj Biofilms and Microbiomes</i> , 2020, 6, 54.	2.9	9
748	Electrolocation? The evidence for redox-mediated taxis in <i>Shewanella oneidensis</i> . <i>Molecular Microbiology</i> , 2020, 115, 1069-1079.	1.2	13
749	Aer Receptors Influence the <i>Pseudomonas chlororaphis</i> PCL1606 Lifestyle. <i>Frontiers in Microbiology</i> , 2020, 11, 1560.	1.5	11

#	ARTICLE	IF	CITATIONS
750	Chemotactic Host-Finding Strategies of Plant Endoparasites and Endophytes. <i>Frontiers in Plant Science</i> , 2020, 11, 1167.	1.7	16
751	From a discrete model of chemotaxis with volume-filling to a generalized Patlak-Keller-Segel model. <i>Proceedings of the Royal Society A: Mathematical, Physical and Engineering Sciences</i> , 2020, 476, 20190871.	1.0	14
752	Bacterial communities of the <i>Salvia lyrata</i> rhizosphere explained by spatial structure and sampling grain. <i>Microbial Ecology</i> , 2020, 80, 846-858.	1.4	8
753	Transcriptomic analysis of a <i>Clostridium thermocellum</i> strain engineered to utilize xylose: responses to xylose versus cellobiose feeding. <i>Scientific Reports</i> , 2020, 10, 14517.	1.6	6
754	Coupling Ion Specificity of the Flagellar Stator Proteins MotA1/MotB1 of <i>Paenibacillus</i> sp. TCA20. <i>Biomolecules</i> , 2020, 10, 1078.	1.8	3
755	Molecular mechanism for rotational switching of the bacterial flagellar motor. <i>Nature Structural and Molecular Biology</i> , 2020, 27, 1041-1047.	3.6	83
756	Mechanisms and Dynamics of the Bacterial Flagellar Motor. <i>Advances in Experimental Medicine and Biology</i> , 2020, 1267, 81-100.	0.8	5
758	The <i>FloR</i> master regulator controls flotation, virulence and antibiotic production in <i>Serratia</i> sp. ATCC 39006. <i>Environmental Microbiology</i> , 2020, 22, 2921-2938.	1.8	2
759	Repurposing a chemosensory macromolecular machine. <i>Nature Communications</i> , 2020, 11, 2041.	5.8	38
760	Bacterial chemotaxis: a way forward to aromatic compounds biodegradation. <i>Environmental Sciences Europe</i> , 2020, 32, .	2.6	42
761	Cellular Stoichiometry of Chemotaxis Proteins in <i>Sinorhizobium meliloti</i> . <i>Journal of Bacteriology</i> , 2020, 202, .	1.0	9
762	Specific Root Exudate Compounds Sensed by Dedicated Chemoreceptors Shape <i>Azospirillum brasilense</i> Chemotaxis in the Rhizosphere. <i>Applied and Environmental Microbiology</i> , 2020, 86, .	1.4	20
763	Information and motility exchange in collectives of active particles. <i>Soft Matter</i> , 2020, 16, 6317-6327.	1.2	18
764	Programmed Proteolysis of Chemotaxis Proteins in <i>Sinorhizobium meliloti</i> : Features in the C-Terminal Region Control McpU Degradation. <i>Journal of Bacteriology</i> , 2020, 202, .	1.0	0
765	Green Plasmonic Nanoparticles and Bio-Inspired Stimuli-Responsive Vesicles in Cancer Therapy Application. <i>Nanomaterials</i> , 2020, 10, 1083.	1.9	22
766	Abl signaling directs growth of a pioneer axon in <i>Drosophila</i> by shaping the intrinsic fluctuations of actin. <i>Molecular Biology of the Cell</i> , 2020, 31, 466-477.	0.9	20
767	An ECF41 Family $\sigma$ Factor Controls Motility and Biogenesis of Lateral Flagella in <i>Azospirillum brasilense</i> Sp245. <i>Journal of Bacteriology</i> , 2020, 202, .	1.0	9
768	ATP Binding as a Key Target for Control of the Chemotaxis Kinase. <i>Journal of Bacteriology</i> , 2020, 202, .	1.0	8

#	ARTICLE	IF	CITATIONS
769	Flagella and Swimming Behavior of Marine Magnetotactic Bacteria. <i>Biomolecules</i> , 2020, 10, 460.	1.8	14
770	From indication to decision: A hierarchical approach to model the chemotactic behavior of <i>Escherichia coli</i> . <i>Journal of Theoretical Biology</i> , 2020, 495, 110253.	0.8	0
771	Noble Metals and Soft Bio-Inspired Nanoparticles in Retinal Diseases Treatment: A Perspective. <i>Cells</i> , 2020, 9, 679.	1.8	34
772	Flagellar motility mediates early-stage biofilm formation in oligotrophic aquatic environment. <i>Ecotoxicology and Environmental Safety</i> , 2020, 194, 110340.	2.9	23
773	Assembly and Dynamics of the Bacterial Flagellum. <i>Annual Review of Microbiology</i> , 2020, 74, 181-200.	2.9	42
774	Bacillus Responses to Plant-Associated Fungal and Bacterial Communities. <i>Frontiers in Microbiology</i> , 2020, 11, 1350.	1.5	76
775	Bacterial flagellar motor as a multimodal biosensor. <i>Methods</i> , 2021, 193, 5-15.	1.9	7
776	Ocular bacterial signatures of exophthalmic disease in farmed turbot ( <i>Scophthalmus maximus</i> ) Tj ETQq1 1 0,784314 rgBT /Over	0.9	4
777	Data-driven statistical modeling of the emergent behavior of biohybrid microrobots. <i>APL Bioengineering</i> , 2020, 4, 016104.	3.3	5
778	Biphasic chemotaxis of <i>Escherichia coli</i> to the microbiota metabolite indole. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2020, 117, 6114-6120.	3.3	42
779	The (PATAN)-CheY-Like Response Regulator PixE Interacts with the Motor ATPase PilB1 to Control Negative Phototaxis in the Cyanobacterium <i>Synechocystis</i> sp. PCC 6803. <i>Plant and Cell Physiology</i> , 2020, 61, 296-307.	1.5	17
780	<i>Pantoea</i> sp. P37 as a novel nonpathogenic host for the heterologous production of rhamnolipids. <i>MicrobiologyOpen</i> , 2020, 9, e1019.	1.2	7
781	Bioinspired reorientation strategies for application in micro/nanorobotic control. <i>Journal of Micro-Bio Robotics</i> , 2020, 16, 173-197.	2.1	7
782	Swarm Hunting and Cluster Ejections in Chemically Communicating Active Mixtures. <i>Scientific Reports</i> , 2020, 10, 5594.	1.6	9
783	Taming the flagellar motor of pseudomonads with a nucleotide messenger. <i>Environmental Microbiology</i> , 2020, 22, 2496-2513.	1.8	8
784	Blue Light-Directed Cell Migration, Aggregation, and Patterning. <i>Journal of Molecular Biology</i> , 2020, 432, 3137-3148.	2.0	21
785	Diversification of <i>Campylobacter jejuni</i> Flagellar C-Ring Composition Impacts Its Structure and Function in Motility, Flagellar Assembly, and Cellular Processes. <i>MBio</i> , 2020, 11, .	1.8	23
786	Intermicrobial Hitchhiking: How Nonmotile Microbes Leverage Communal Motility. <i>Trends in Microbiology</i> , 2021, 29, 542-550.	3.5	19

#	ARTICLE	IF	CITATIONS
787	<scp>MerF</scp> is a novel regulator of deep-sea <i>Pseudomonas stutzeri</i> flagellum biogenesis and motility. Environmental Microbiology, 2021, 23, 110-125.	1.8	11
788	The force awakens: The dark side of mechanosensing in bacterial pathogens. Cellular Signalling, 2021, 78, 109867.	1.7	7
789	Biofilm on Medical Appliances. , 2021, , 157-182.		1
790	Bacterial Foraging Algorithm Based on Activity of Bacteria for DNA Computing Sequence Design. IEEE Access, 2021, 9, 2110-2124.	2.6	6
791	Bioactive small molecules produced by the human gut microbiome modulate <i>Vibrio cholerae</i> sessile and planktonic lifestyles. Gut Microbes, 2021, 13, 1-19.	4.3	4
792	The <i>Campylobacter jejuni</i> chemoreceptor Tlp10 has a bimodal ligand-binding domain and specificity for multiple classes of chemoeffectors. Science Signaling, 2021, 14, .	1.6	29
793	Average search time bounds in cue-based searches. Physical Review E, 2021, 103, 022124.	0.8	0
794	The <i>Azospirillum brasilense</i> Core Chemotaxis Proteins CheA1 and CheA4 Link Chemotaxis Signaling with Nitrogen Metabolism. MSystems, 2021, 6, .	1.7	10
795	Identification of a Putative Sensor Protein Involved in Regulation of Vesicle Production by a Hypervesiculating Bacterium, <i>Shewanella vesiculosa</i> HM13. Frontiers in Microbiology, 2021, 12, 629023.	1.5	3
796	The RsmA RNA-Binding Proteins in <i>Pseudomonas syringae</i> Exhibit Distinct and Overlapping Roles in Modulating Virulence and Survival Under Different Nutritional Conditions. Frontiers in Plant Science, 2021, 12, 637595.	1.7	9
797	Review on Stress Tolerance in <i>Campylobacter jejuni</i> . Frontiers in Cellular and Infection Microbiology, 2020, 10, 596570.	1.8	27
798	cheA, cheB, cheR, cheV, and cheY Are Involved in Regulating the Adhesion of <i>Vibrio harveyi</i> . Frontiers in Cellular and Infection Microbiology, 2020, 10, 591751.	1.8	21
799	The Photosynthetic Bacterium <i>Rhodospseudomonas palustris</i> Strain PS3 Exerts Plant Growth-Promoting Effects by Stimulating Nitrogen Uptake and Elevating Auxin Levels in Expanding Leaves. Frontiers in Plant Science, 2021, 12, 573634.	1.7	24
801	The influence of spaceflight and simulated microgravity on bacterial motility and chemotaxis. Npj Microgravity, 2021, 7, 7.	1.9	34
802	Deciphering bacterial mechanisms of root colonization. Environmental Microbiology Reports, 2021, 13, 428-444.	1.0	75
803	Swimming <i>Escherichia coli</i> Cells Explore the Environment by Lévy Walk. Applied and Environmental Microbiology, 2021, 87, .	1.4	13
804	Emergence of Bimodal Motility in Active Droplets. Physical Review X, 2021, 11, .	2.8	26
805	Transcriptome Analysis Revealed Overlapping and Special Regulatory Roles of RpoN1 and RpoN2 in Motility, Virulence, and Growth of <i>Xanthomonas oryzae</i> pv. <i>oryzae</i> . Frontiers in Microbiology, 2021, 12, 653354.	1.5	3

#	ARTICLE	IF	CITATIONS
806	Sucrose triggers a novel signaling cascade promoting <i>Bacillus subtilis</i> rhizosphere colonization. ISME Journal, 2021, 15, 2723-2737.	4.4	63
807	State of the art of bacterial chemotaxis. Journal of Basic Microbiology, 2021, 61, 366-379.	1.8	51
808	An Agent-Based Model for Simulating Electrified Social Insects Traffic Behavior. Brazilian Journal of Physics, 2021, 51, 653-660.	0.7	0
809	Mechanosensitive remodeling of the bacterial flagellar motor is independent of direction of rotation. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	19
810	Ligand sensing enhances bacterial flagellar motor output via stator recruitment. ELife, 2021, 10, .	2.8	6
811	Nanoparticles Interfere with Chemotaxis: An Example of Nanoparticles as Molecular "Knockouts" at the Cellular Level. ACS Nano, 2021, 15, 8813-8825.	7.3	6
812	Patterns of bacterial motility in microfluidics-confining environments. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	28
813	Structure of a double CACHE chemoreceptor ligand-binding domain from <i>Pseudomonas syringae</i> provides insights into the basis of proline recognition. Biochemical and Biophysical Research Communications, 2021, 549, 194-199.	1.0	4
814	Casting Light on the Adaptation Mechanisms and Evolutionary History of the Widespread Sumerlaeota. MBio, 2021, 12, .	1.8	12
815	Combining two optimized and affordable methods to assign chemoreceptors to a specific signal. Analytical Biochemistry, 2021, 620, 114139.	1.1	11
816	Global transcriptomic response of <i>Listeria monocytogenes</i> exposed to Fingered Citron ( <i>Citrus medica</i> ) Tj ETQq0 0 0 rgBT /Overlock 10 T	2.9	18
817	Right place, right time: Environmental sensing and signal transduction directs cellular differentiation and motility in <i>Trypanosoma brucei</i> . Molecular Microbiology, 2021, 115, 930-941.	1.2	9
818	Minimal physicalism as a scale-free substrate for cognition and consciousness. Neuroscience of Consciousness, 2021, 2021, niab013.	1.4	24
819	Au/Pt "Egg in a Nest" Nanomotor for Glucose-Powered Catalytic Motion and Enhanced Molecular Transport to Living Cells. Angewandte Chemie - International Edition, 2021, 60, 17579-17586.	7.2	36
820	A Bacterial Inflammation Sensor Regulates c-di-GMP Signaling, Adhesion, and Biofilm Formation. MBio, 2021, 12, e0017321.	1.8	9
821	Au/Pt "Egg in a Nest" Nanomotor for Glucose-Powered Catalytic Motion and Enhanced Molecular Transport to Living Cells. Angewandte Chemie, 2021, 133, 17720-17727.	1.6	4
822	Hyphal exudates of an arbuscular mycorrhizal fungus <i>Rhizophagus irregularis</i> ; induce phosphate-solubilizing bacterium <i>Rahnella aquatilis</i> ; to swim towards its hyphae. Chinese Science Bulletin, 2021, , .	0.4	1
823	Asymptotic stability of exogenous chemotaxis systems with physical boundary conditions. Quarterly of Applied Mathematics, 2021, 79, 717-743.	0.5	5

#	ARTICLE	IF	CITATIONS
824	A slight bending of an $\alpha$ -helix in FlIM creates a counterclockwise-locked structure of the flagellar motor in <i>Vibrio</i> . <i>Journal of Biochemistry</i> , 2021, 170, 531-538.	0.9	6
825	Multiple functions of flagellar motility and chemotaxis in bacterial physiology. <i>FEMS Microbiology Reviews</i> , 2021, 45, .	3.9	122
826	Structural basis of torque generation in the bi-directional bacterial flagellar motor. <i>Trends in Biochemical Sciences</i> , 2022, 47, 160-172.	3.7	35
827	Theoretical Constraints Imposed by Gradient Detection and Dispersal on Microbial Size in Astrobiological Environments. <i>Astrobiology</i> , 2021, 21, 813-830.	1.5	4
828	Establishment of GC-MS method for the determination of <i>Pseudomonas aeruginosa</i> biofilm and its application in metabolite enrichment analysis. <i>Journal of Chromatography B: Analytical Technologies in the Biomedical and Life Sciences</i> , 2021, 1179, 122839.	1.2	5
829	Temporal and Spatial Signaling Mediating the Balance of the Plankton Microbiome. <i>Annual Review of Marine Science</i> , 2022, 14, 239-260.	5.1	7
831	<i>C. elegans</i> colony formation as a condensation phenomenon. <i>Nature Communications</i> , 2021, 12, 4947.	5.8	7
832	Reconfigurable artificial microswimmers with internal feedback. <i>Nature Communications</i> , 2021, 12, 4762.	5.8	34
834	Label-Free Quantitative Proteomic Analysis of the Global Response to Indole-3-Acetic Acid in Newly Isolated <i>Pseudomonas</i> sp. Strain LY1. <i>Frontiers in Microbiology</i> , 2021, 12, 694874.	1.5	1
835	McpT, a Broad-Range Carboxylate Chemoreceptor in <i>Sinorhizobium meliloti</i> . <i>Journal of Bacteriology</i> , 2021, 203, e0021621.	1.0	7
837	Annotation of chemotaxis gene clusters and proteins involved in chemotaxis of <i>Bacillus subtilis</i> strain MB378 capable of biodecolorizing different dyes. <i>Environmental Science and Pollution Research</i> , 2022, 29, 3510-3520.	2.7	3
838	Transmembrane transport in inorganic colloidal cell-mimics. <i>Nature</i> , 2021, 597, 220-224.	13.7	29
839	Engineering Cell-Based Systems for Smart Cancer Therapy. <i>Advanced Intelligent Systems</i> , 2022, 4, 2100134.	3.3	14
841	Prevalence and Specificity of Chemoreceptor Profiles in Plant-Associated Bacteria. <i>MSystems</i> , 2021, 6, e0095121.	1.7	20
842	Effects of different surfactants on the degradation of petroleum hydrocarbons by mixed $\alpha$ -bacteria. <i>Journal of Chemical Technology and Biotechnology</i> , 2022, 97, 208-217.	1.6	6
843	The Semiotic Approach to Bacterial Chemotaxis. <i>Biosemiotics</i> , 2021, 14, 743-766.	0.8	1
844	Novel perspectives of environmental proteomics. <i>Science of the Total Environment</i> , 2021, 788, 147588.	3.9	7
845	Genome analysis of a salinity adapted <i>Achromobacter xylosoxidans</i> rhizobacteria from the date palm. <i>Rhizosphere</i> , 2021, 19, 100401.	1.4	9

#	ARTICLE	IF	CITATIONS
846	Bacterial motility: machinery and mechanisms. <i>Nature Reviews Microbiology</i> , 2022, 20, 161-173.	13.6	167
847	Effects of tolC on tolerance to bile salts and biofilm formation in <i>Cronobacter malonaticus</i> . <i>Journal of Dairy Science</i> , 2021, 104, 9521-9531.	1.4	5
848	Engineering of Sensory Proteins with New Ligand-Binding Capacities. , 2022, , 223-242.		0
850	Nonequilibrium polarity-induced chemotaxis: Emergent Galilean symmetry and exact scaling exponents. <i>Physical Review Research</i> , 2021, 3, .	1.3	18
851	Source-Seeking Control of Unicycle Robots With 3-D-Printed Flexible Piezoresistive Sensors. <i>IEEE Transactions on Robotics</i> , 2022, 38, 448-462.	7.3	3
852	Linking single-cell decisions to collective behaviours in social bacteria. <i>Philosophical Transactions of the Royal Society B: Biological Sciences</i> , 2021, 376, 20190755.	1.8	10
853	Cluster II che genes of <i>Pseudomonas syringae</i> pv. <i>tabaci</i> 6605, orthologs of cluster I in <i>Pseudomonas aeruginosa</i> , are required for chemotaxis and virulence. <i>Molecular Genetics and Genomics</i> , 2021, 296, 299-312.	1.0	6
856	Prokaryotic Systems Biology. <i>Cell Engineering</i> , 2007, , 395-423.	0.4	1
857	The Initial Steps in <i>Agrobacterium Tumefaciens</i> Pathogenesis: Chemical Biology of Host Recognition. , 2008, , 221-241.		5
858	Single-Molecule Studies of Rotary Molecular Motors. , 2009, , 183.		2
859	Swimming and Behavior in Purple Non-Sulfur Bacteria. <i>Advances in Photosynthesis and Respiration</i> , 2009, , 643-654.	1.0	2
860	Molecular Diffusion and Compartmentalization in Signal Transduction Pathways: An Application of Membrane Systems to the Study of Bacterial Chemotaxis. <i>Emergence, Complexity and Computation</i> , 2014, , 65-96.	0.2	1
862	Enzymes for Aerobic Degradation of Alkanes in Bacteria. , 2017, , 1-25.		10
863	Chemotaxis. , 2010, , 1529-1543.		2
865	What the <i>Escherichia Coli</i> Tells Neurons about Learning. , 2012, , 41-55.		12
866	Application of optical tweezers for biochemical and thermal cell stimulation. , 2017, , 385-410.		2
867	Colonization, localization, and inflammation: the roles of <i>H. pylori</i> chemotaxis in vivo. <i>Current Opinion in Microbiology</i> , 2018, 41, 51-57.	2.3	99
869	Swimming in the sea: chemotaxis by marine bacteria. <i>Microbiology Australia</i> , 2018, 39, 12.	0.1	4



#	ARTICLE	IF	CITATIONS
870	Blue light emitting diodes enhance the antivirulence effects of Curcumin against <i>Helicobacter pylori</i> . <i>Journal of Medical Microbiology</i> , 2020, 69, 617-624.	0.7	15
871	A global genomic approach uncovers novel components for twitching motility-mediated biofilm expansion in <i>Pseudomonas aeruginosa</i> . <i>Microbial Genomics</i> , 2018, 4, .	1.0	17
872	Bacterial hybrid histidine kinases in plant-bacteria interactions. <i>Microbiology (United Kingdom)</i> , 2016, 162, 1715-1734.	0.7	12
873	The <i>Agrobacterium tumefaciens</i> CheY-like protein ClaR regulates biofilm formation. <i>Microbiology (United Kingdom)</i> , 2017, 163, 1680-1691.	0.7	11
874	Chemotaxis to self-generated AI-2 promotes biofilm formation in <i>Escherichia coli</i> . <i>Microbiology (United Kingdom)</i> , 2017, 163, 1778-1790.	0.7	44
875	Phylogenetic characterization of the energy taxis receptor Aer in <i>Pseudomonas</i> and phenotypic characterization in <i>Pseudomonas pseudoalcaligenes</i> KF707. <i>Microbiology (United Kingdom)</i> , 2019, 165, 1331-1344.	0.7	1
876	Coupling metabolism and chemotaxis-dependent behaviours by energy taxis receptors. <i>Microbiology (United Kingdom)</i> , 2010, 156, 2283-2293.	0.7	75
885	Persistence-Speed Coupling Enhances the Search Efficiency of Migrating Immune Cells. <i>Physical Review Letters</i> , 2020, 125, 268102.	2.9	27
886	The <i>Pseudomonas syringae</i> pv. <i>actinidiae</i> chemoreceptor protein F (PscF) periplasmic sensor domain: cloning, purification and X-ray crystallographic analysis. <i>Acta Crystallographica Section F, Structural Biology Communications</i> , 2017, 73, 701-705.	0.4	6
887	Flagellation and Chemotaxis. , 0, , 385-410.		10
888	Motility and Chemotaxis. , 0, , 113-132.		6
889	Identification of Positive Chemotaxis in the Protozoan Pathogen <i>Trypanosoma brucei</i> . <i>MSphere</i> , 2020, 5, .	1.3	15
890	Evolutionary Genomics Suggests That CheV Is an Additional Adaptor for Accommodating Specific Chemoreceptors within the Chemotaxis Signaling Complex. <i>PLoS Computational Biology</i> , 2016, 12, e1004723.	1.5	34
891	A Comprehensive Genetic Characterization of Bacterial Motility. <i>PLoS Genetics</i> , 2005, preprint, e154.	1.5	3
892	Phenotype Fingerprinting Suggests the Involvement of Single-Genotype Consortia in Degradation of Aromatic Compounds by <i>Rhodospseudomonas palustris</i> . <i>PLoS ONE</i> , 2009, 4, e4615.	1.1	17
893	Developing Stochastic Models for Spatial Inference: Bacterial Chemotaxis. <i>PLoS ONE</i> , 2010, 5, e10464.	1.1	2
894	Protein Folding Modulates the Swapped Dimerization Mechanism of Methyl-Accepting Chemotaxis Heme Sensors. <i>PLoS ONE</i> , 2012, 7, e46328.	1.1	11
895	Chemoreceptors of <i>Escherichia coli</i> CFT073 Play Redundant Roles in Chemotaxis toward Urine. <i>PLoS ONE</i> , 2013, 8, e54133.	1.1	26

#	ARTICLE	IF	CITATIONS
896	Influence of Magnetic Fields on Magneto-Aerotaxis. PLoS ONE, 2014, 9, e101150.	1.1	49
897	Physiological and Genomic Features of a Novel Sulfur-Oxidizing Gammaproteobacterium Belonging to a Previously Uncultivated Symbiotic Lineage Isolated from a Hydrothermal Vent. PLoS ONE, 2014, 9, e104959.	1.1	40
898	Insight into Dominant Cellulolytic Bacteria from Two Biogas Digesters and Their Glycoside Hydrolase Genes. PLoS ONE, 2015, 10, e0129921.	1.1	38
899	Scarless deletion of up to seven methyl-accepting chemotaxis genes with an optimized method highlights key function of CheM in Salmonella Typhimurium. PLoS ONE, 2017, 12, e0172630.	1.1	52
900	The <i>Vibrio cholerae</i> ToxR Regulon Encodes Host-Specific Chemotaxis Proteins that Function in Intestinal Colonization. SOJ Microbiology & Infectious Diseases, 2015, 3, 01-05.	0.7	8
901	On the stabilizing effect of chemotaxis on bacterial aggregation patterns. Applied Mathematics and Nonlinear Sciences, 2017, 2, 157-172.	0.9	7
902	Simulating the Bacterial Chemotaxis Pathway at High Spatio-temporal Detail. Current Chemical Biology, 2014, 7, 214-223.	0.2	4
903	A study on the combined interplay between stochastic fluctuations and the number of flagella in bacterial chemotaxis. Electronic Proceedings in Theoretical Computer Science, EPTCS, 0, 6, 47-62.	0.8	5
904	Uniform categorization of biocommunication in bacteria, fungi and plants. World Journal of Biological Chemistry, 2010, 1, 160.	1.7	11
906	c-di-GMP heterogeneity is generated by the chemotaxis machinery to regulate flagellar motility. ELife, 2013, 2, e01402.	2.8	103
907	Escherichia coli swimming is robust against variations in flagellar number. ELife, 2014, 3, e01916.	2.8	65
908	Structure of bacterial cytoplasmic chemoreceptor arrays and implications for chemotactic signaling. ELife, 2014, 3, e02151.	2.8	112
909	Cyanobacteria use micro-optics to sense light direction. ELife, 2016, 5, .	2.8	125
910	Coupling chemosensory array formation and localization. ELife, 2017, 6, .	2.8	27
911	Lack of evidence for associative learning in pea plants. ELife, 2020, 9, .	2.8	21
912	Back from the dead; the curious tale of the predatory cyanobacterium <i>Vampirovibrio chlorellavorus</i> . PeerJ, 2015, 3, e968.	0.9	104
914	The Hypoxia-Associated Localization of Chemotaxis Protein CheZ in Azorhizobium caulinodans. Frontiers in Microbiology, 2021, 12, 731419.	1.5	0
915	Leave or Stay: Simulating Motility and Fitness of Microorganisms in Dynamic Aquatic Ecosystems. Biology, 2021, 10, 1019.	1.3	2

#	ARTICLE	IF	CITATIONS
916	Bioactive Synthetic Polymers. <i>Advanced Materials</i> , 2022, 34, e2105063.	11.1	66
917	<i>E. coli</i> aggregation and impaired cell division after terahertz irradiation. <i>Scientific Reports</i> , 2021, 11, 20464.	1.6	5
918	Effect of inoculum size and antibiotics on bacterial traveling bands in a thin microchannel defined by optical adhesive. <i>Microsystems and Nanoengineering</i> , 2021, 7, 86.	3.4	3
919	Virulence factors of foodborne pathogen <i>Campylobacter jejuni</i> . <i>Microbial Pathogenesis</i> , 2021, 161, 105265.	1.3	21
922	<i>Bacteria Communication.</i> , 2010, , 109-128.		0
923	Introduction: Key Levels of Biocommunication of Bacteria. <i>Soil Biology</i> , 2011, , 1-34.	0.6	1
924	Coordinated Regulation of Multiple Flagellar Motors on a Single <i>Escherichia coli</i> Cell. <i>Seibutsu Butsuri</i> , 2011, 51, 234-235.	0.0	0
925	<i>Photoecology and Environmental Photobiology.</i> , 2012, , 1117-1135.		0
926	A Model Library of Bacterial Chemotaxis on E-Cell System. <i>Molecular Biology Intelligence Unit</i> , 2013, , 65-73.	0.2	0
927	<i>Microbial Cell Individuality.</i> , 0, , 221-243.		0
928	Choosing the Right Lifestyle: Regulation of Developmental Pathways by Cyclic Di-GMP. , 0, , 97-119.		0
940	<i>Engineering of Sensory Proteins with New Ligand-Binding Capacities.</i> , 2019, , 1-21.		3
950	Towards the Idea of Molecular Brains. <i>International Journal of Molecular Sciences</i> , 2021, 22, 11868.	1.8	19
951	<i>Chemical Ecology of Choanoflagellates.</i> , 2020, , 45-65.		3
954	A novel degradation mechanism of naphthenic acids by marine <i>Pseudoalteromonas</i> sp.. <i>Journal of Hazardous Materials</i> , 2022, 424, 127534.	6.5	10
955	<i>Green Synthesis of Nanoparticles and Their Application in Cancer Therapy.</i> , 2020, , 163-197.		5
957	Efficiency and Robustness of Processes Driven by Nucleoid Exclusion in <i>Escherichia coli</i> . <i>Advances in Experimental Medicine and Biology</i> , 2020, 1267, 59-80.	0.8	1
958	<i>Phylogeny of Chemical Sensitivity.</i> , 2020, , 4-23.		0

#	ARTICLE	IF	CITATIONS
961	A Mathematical Description of Bacterial Chemotaxis in Response to Two Stimuli. <i>Bulletin of Mathematical Biology</i> , 2022, 84, 9.	0.9	3
962	Oriental memory of active particles in multistate non-Markovian processes. <i>Physical Review E</i> , 2021, 104, 054613.	0.8	6
963	Bacterial and Archaeal Community Distribution in Oilfield Water Re-injection Facilities and the Influences from Microorganisms in Injected Water. <i>Microbial Ecology</i> , 2021, , 1.	1.4	1
964	Biohybrid Microrobots. , 2022, , 305-347.		1
965	Azorhizobium caulinodans Chemotaxis Is Controlled by an Unusual Phosphorelay Network. <i>Journal of Bacteriology</i> , 2022, 204, JB0052721.	1.0	9
966	Phototaxis in Cyanobacteria: From Mutants to Models of Collective Behavior. <i>MBio</i> , 2021, 12, e0239821.	1.8	7
967	Collective self-optimization of communicating active particles. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2021, 118, .	3.3	9
968	Comparative Proteomic Analysis for a Putative Pyridoxal Phosphate-Dependent Aminotransferase Required for Virulence in <i>Acidovorax citrulli</i> . <i>Plant Pathology Journal</i> , 2021, 37, 673-680.	0.7	5
969	<i>Pseudomonas aeruginosa</i> Mobbing-Like Behavior against <i>Acanthamoeba castellanii</i> Bacterivore and Its Rapid Control by Quorum Sensing and Environmental Cues. <i>Microbiology Spectrum</i> , 2021, 9, e0064221.	1.2	4
970	Function of Fe(III)-minerals in the enhancement of anammox performance exploiting integrated network and metagenomics analyses. <i>Water Research</i> , 2022, 210, 117998.	5.3	50
971	Genome Analysis of the <i>Janthinobacterium</i> sp. Strain SLB01 from the Diseased Sponge of the <i>Lubomirskia baicalensis</i> . <i>Current Issues in Molecular Biology</i> , 2021, 43, 2220-2237.	1.0	3
972	Transcriptomics and Functional Analysis of Copper Stress Response in the Sulfate-Reducing Bacterium <i>Desulfovibrio alaskensis</i> G20. <i>International Journal of Molecular Sciences</i> , 2022, 23, 1396.	1.8	9
973	Possible mechanisms for the equilibrium of ACC and role of ACC deaminase-producing bacteria. <i>Applied Microbiology and Biotechnology</i> , 2022, 106, 877-887.	1.7	30
974	A novel, time-effective approach for capturing bacteria from contaminated urine samples. <i>Frontiers in Bioscience</i> , 2022, 27, 1.	0.8	0
975	Tailoring <i>Escherichia coli</i> Chemotactic Sensing towards Cadmium by Computational Redesign of Ribose-Binding Protein. <i>MSystems</i> , 2022, , e0108421.	1.7	2
976	Two-species competition model with chemotaxis: well-posedness, stability and dynamics. <i>Nonlinearity</i> , 2022, 35, 1329-1359.	0.6	4
977	The Response Regulator FlmD Regulates Biofilm Formation in <i>Comamonas testosteroni</i> through the Transcriptional Activator SoxR. <i>Microorganisms</i> , 2022, 10, 356.	1.6	1
978	Intelligence as a planetary scale process. <i>International Journal of Astrobiology</i> , 2022, 21, 47-61.	0.9	19

#	ARTICLE	IF	CITATIONS
979	Biohybrid Micro- and Nanorobots for Intelligent Drug Delivery. <i>Cyborg and Bionic Systems</i> , 2022, 2022, .	3.7	28
980	A geometric criterion for the optimal spreading of active polymers in porous media. <i>Nature Communications</i> , 2021, 12, 7088.	5.8	35
981	A coupled 3D-1D multiscale Keller-Segel model of chemotaxis and its application to cancer invasion. <i>Discrete and Continuous Dynamical Systems - Series S</i> , 2022, .	0.6	1
982	Survival in a Sea of Gradients: Bacterial and Archaeal Foraging in a Heterogeneous Ocean. <i>The Microbiomes of Humans, Animals, Plants, and the Environment</i> , 2022, , 47-102.	0.2	1
983	Dynamics of Gradient Sensing and Chemotaxis. , 2022, , .		0
984	Chemical-to-mechanical molecular computation using DNA-based motors with onboard logic. <i>Nature Nanotechnology</i> , 2022, 17, 514-523.	15.6	17
985	DSRP Theory: A Primer. <i>Systems</i> , 2022, 10, 26.	1.2	10
986	Diffusiophoresis, Diffusioosmosis, and Microfluidics: Surface-Flow-Driven Phenomena in the Presence of Flow. <i>Chemical Reviews</i> , 2022, 122, 6986-7009.	23.0	36
987	<i>Pseudomonas aeruginosa</i> PAO1 Is Attracted to Bovine Bile in a Novel, Cystic Fibrosis-Derived Bronchial Epithelial Cell Model. <i>Microorganisms</i> , 2022, 10, 716.	1.6	2
988	Imaging whole-brain activity to understand behaviour. <i>Nature Reviews Physics</i> , 2022, 4, 292-305.	11.9	24
989	Cyanobacteria: Model Microorganisms and Beyond. <i>Microorganisms</i> , 2022, 10, 696.	1.6	26
990	Distinctions Organize Information in Mind and Nature: Empirical Findings of Identityâ€œOther Distinctions (D) in Cognitive and Material Complexity. <i>Systems</i> , 2022, 10, 41.	1.2	4
991	The â€œFish Tankâ€œExperiments: Metacognitive Awareness of Distinctions, Systems, Relationships, and Perspectives (DSRP) Significantly Increases Cognitive Complexity. <i>Systems</i> , 2022, 10, 29.	1.2	4
992	Engineered Living Hydrogels. <i>Advanced Materials</i> , 2022, 34, e2201326.	11.1	75
993	Flagellin outer domain dimerization modulates motility in pathogenic and soil bacteria from viscous environments. <i>Nature Communications</i> , 2022, 13, 1422.	5.8	10
994	Systems Organize Information in Mind and Nature: Empirical Findings of Part-Whole Systems (S) in Cognitive and Material Complexity. <i>Systems</i> , 2022, 10, 44.	1.2	2
995	Unveiling the chemotactic response and mechanism of <i>Shewanella oneidensis</i> MR-1 to nitrobenzene. <i>Journal of Hazardous Materials</i> , 2022, 431, 128629.	6.5	5
996	Photogytactic Concentration of a Population of Swimming Microalgae Across a Porous Layer. <i>Frontiers in Physics</i> , 2021, 9, .	1.0	3

#	ARTICLE	IF	CITATIONS
997	Gene Analysis of <i>Listeria monocytogenes</i> Suspended Aggregates Induced by <i>Ralstonia insidiosa</i> Cell-Free Supernatants under Nutrient-Poor Environments. <i>Microorganisms</i> , 2021, 9, 2591.	1.6	3
998	The Role of RelA and SpoT on ppGpp Production, Stress Response, Growth Regulation, and Pathogenicity in <i>Xanthomonas campestris</i> pv. <i>campestris</i> . <i>Microbiology Spectrum</i> , 2021, 9, e0205721.	1.2	7
1000	Enhancing Metabolic Efficiency through Optimizing Metabolizable Protein Profile in a Time Progressive Manner with Weaned Goats as a Model: Involvement of Gut Microbiota. <i>Microbiology Spectrum</i> , 2022, 10, e0254521.	1.2	5
1001	Perspectives Organize Information in Mind and Nature: Empirical Findings of Point-View Perspective (P) in Cognitive and Material Complexity. <i>Systems</i> , 2022, 10, 52.	1.2	8
1002	Chemotaxis shapes the microscale organization of the ocean's microbiome. <i>Nature</i> , 2022, 605, 132-138.	13.7	51
1022	Diffusible signal factor enhances the saline-alkaline resistance and rhizosphere colonization of <i>Stenotrophomonas rhizophila</i> by coordinating optimal metabolism. <i>Science of the Total Environment</i> , 2022, 834, 155403.	3.9	12
1023	Predicted Functional Shifts Due to Type of Soil Microbiome and Watering of Two Wild Plants in Western Region of Saudi Arabia. <i>Phyton</i> , 2022, 91, 2249-2268.	0.4	1
1024	Genomic Features of the Bundle-Forming Heliobacterium <i>Heliophilum fasciatum</i> . <i>Microorganisms</i> , 2022, 10, 869.	1.6	1
1025	Effect of an inorganic nitrogen source (NH <sub>4</sub> ) <sub>2</sub> SO <sub>4</sub> on the production of welan gum from <i>Sphingomonas</i> sp. mutant obtained through UV-ARTP compound mutagenesis. <i>International Journal of Biological Macromolecules</i> , 2022, 210, 630-638.	3.6	10
1026	Impacts of food waste to sludge ratios on microbial dynamics and functional traits in thermophilic digesters. <i>Water Research</i> , 2022, 219, 118590.	5.3	4
1028	Seed-Borne <i>Erwinia persicina</i> Affects the Growth and Physiology of Alfalfa ( <i>Medicago sativa</i> L.). <i>Frontiers in Microbiology</i> , 2022, 13, .	1.5	4
1030	Relationships Organize Information in Mind and Nature: Empirical Findings of Action-Reaction Relationships (R) in Cognitive and Material Complexity. <i>Systems</i> , 2022, 10, 71.	1.2	1
1032	Swimming Using a Unidirectionally Rotating, Single Stopping Flagellum in the Alpha Proteobacterium <i>Rhodobacter sphaeroides</i> . <i>Frontiers in Microbiology</i> , 2022, 13, .	1.5	1
1034	The meaning and origin of goal-directedness: a dynamical systems perspective. <i>Biological Journal of the Linnean Society</i> , 2023, 139, 370-387.	0.7	14
1035	Bacterial chemotaxis in static gradients quantified in a biopolymer membrane-integrated microfluidic platform. <i>Lab on A Chip</i> , 2022, 22, 3203-3216.	3.1	6
1037	Biocomotion and Premelting in Ice. <i>Frontiers in Physics</i> , 0, 10, .	1.0	1
1038	The evolutionary path of chemosensory and flagellar macromolecular machines in <i>Campylobacterota</i> . <i>PLoS Genetics</i> , 2022, 18, e1010316.	1.5	8
1039	Genome Analysis of <i>Enterobacter asburiae</i> and <i>Lelliottia</i> spp. Proliferating in Oligotrophic Drinking Water Reservoirs and Lakes. <i>Applied and Environmental Microbiology</i> , 2022, 88, .	1.4	8

#	ARTICLE	IF	CITATIONS
1040	Transcriptome Profiling of <i>Stenotrophomonas</i> sp. Strain WZN-1 Reveals Mechanisms of 2,2,4,4-Tetrabromodiphenyl Ether (BDE-47) Biotransformation. <i>Environmental Science &amp; Technology</i> , 2022, 56, 11288-11299.	4.6	7
1041	Antibiofilm and Antiquorum Sensing Potential of <i>Lactiplantibacillus plantarum</i> Z057 against <i>Vibrio parahaemolyticus</i> . <i>Foods</i> , 2022, 11, 2230.	1.9	6
1042	Bio-inspired source seeking and obstacle avoidance on a palm-sized drone. , 2022, , .		4
1043	Two-way chemotaxis-based communication for biological nanonetworks. <i>International Journal of Communication Systems</i> , 0, , .	1.6	1
1044	Comparative Genomics Insights into a Novel Biocontrol Agent <i>Paenibacillus peoriae</i> Strain ZF390 against Bacterial Soft Rot. <i>Biology</i> , 2022, 11, 1172.	1.3	2
1045	Comparative analysis reveals distinctive genomic features of Taiwan hot-spring cyanobacterium <i>Thermosynechococcus</i> sp. TA-1. <i>Frontiers in Microbiology</i> , 0, 13, .	1.5	2
1046	Colloidal Active Matter Mimics the Behavior of Biological Microorganisms—An Overview. <i>Small</i> , 2023, 19, .	5.2	3
1047	Active chiral molecules in activity gradients. <i>Journal of Chemical Physics</i> , 2022, 157, .	1.2	3
1048	Surface-Induced cAMP Signaling Requires Multiple Features of the <i>Pseudomonas aeruginosa</i> Type IV Pili. <i>Journal of Bacteriology</i> , 2022, 204, .	1.0	5
1049	Steady-state running rate sets the speed and accuracy of accumulation of swimming bacteria. <i>Biophysical Journal</i> , 2022, 121, 3435-3444.	0.2	0
1051	Distinct speed and direction memories of migrating dendritic cells diversify their search strategies. <i>Biophysical Journal</i> , 2022, 121, 4099-4108.	0.2	6
1053	Phase transitions in bacteria—From structural transitions in free living bacteria to phenotypic transitions in bacteria within biofilms. <i>Physics of Life Reviews</i> , 2022, 43, 98-138.	1.5	2
1054	Novel prokaryotic system employing previously unknown nucleic acids-based receptors. <i>Microbial Cell Factories</i> , 2022, 21, .	1.9	5
1055	Global and gene-specific translational regulation in <i>Escherichia coli</i> across different conditions. <i>PLoS Computational Biology</i> , 2022, 18, e1010641.	1.5	2
1056	Light-Controlled Microbots in Biomedical Application: A Review. <i>Applied Sciences (Switzerland)</i> , 2022, 12, 11013.	1.3	6
1058	Genetic Code Expansion in <i>Pseudomonas putida</i> KT2440. <i>ACS Synthetic Biology</i> , 2022, 11, 3724-3732.	1.9	3
1059	The in Vitro Fermentation of <i>Cordyceps militaris</i> Polysaccharides Changed the Simulated Gut Condition and Influenced Gut Bacterial Motility and Translocation. <i>Journal of Agricultural and Food Chemistry</i> , 2022, 70, 14193-14204.	2.4	1
1060	Redox properties and PAS domain structure of the <i>Escherichia coli</i> energy sensor Aer indicate a multistate sensing mechanism. <i>Journal of Biological Chemistry</i> , 2022, 298, 102598.	1.6	7

#	ARTICLE	IF	CITATIONS
1061	Controlled gel expansion through colloid oscillation. <i>Physical Review E</i> , 2022, 106, .	0.8	0
1062	Interdomain Linkers Regulate Histidine Kinase Activity by Controlling Subunit Interactions. <i>Biochemistry</i> , 2022, 61, 2672-2686.	1.2	2
1063	The effects of emerging contaminants on the behaviour of <i>Acinetobacter calcoaceticus</i> derived from biofilms. <i>Environmental Science: Water Research and Technology</i> , 2022, 9, 74-85.	1.2	3
1064	Insights into the Orchestration of Gene Transcription Regulators in <i>Helicobacter pylori</i> . <i>International Journal of Molecular Sciences</i> , 2022, 23, 13688.	1.8	4
1066	A Nitrate-Sensing Domain-Containing Chemoreceptor Is Required for Successful Entry and Virulence of <i>Dickeya dadantii</i> 3937 in Potato Plants. <i>Phytopathology</i> , 2023, 113, 390-399.	1.1	1
1067	Mechanisms of <i>E. coli</i> chemotaxis signaling pathways visualized using cryoET and computational approaches. <i>Biochemical Society Transactions</i> , 2022, 50, 1595-1605.	1.6	6
1068	Plasmonic Probing Single-Cell Bio-Current Waves with a Shrinking Magnetite Nanoprobe. <i>ACS Nano</i> , 2022, 16, 20842-20850.	7.3	1
1069	Design of Christmas-Tree-like Microfluidic Gradient Generators for Cell-Based Studies. <i>Chemosensors</i> , 2023, 11, 2.	1.8	1
1070	Exploring the Interspecific Interactions and the Metabolome of the Soil Isolate <i>Hylemonella gracilis</i> . <i>MSystems</i> , 0, , .	1.7	0
1071	Suicidal chemotaxis in bacteria. <i>Nature Communications</i> , 2022, 13, .	5.8	5
1073	On the Chemical Origin of Biological Cognition. <i>Life</i> , 2022, 12, 2016.	1.1	6
1074	The Chemoreceptor Sensory Adaptation System Produces Coordinated Reversals of the Flagellar Motors on an <i>Escherichia coli</i> Cell. <i>Journal of Bacteriology</i> , 2022, 204, .	1.0	0
1076	Defining Two Chemosensory Arrays in <i>Shewanella oneidensis</i> . <i>Biomolecules</i> , 2023, 13, 21.	1.8	0
1079	Metabolic Sensing of Extracytoplasmic Copper Availability via Translational Control by a Nascent Exported Protein. <i>MBio</i> , 2023, 14, .	1.8	2
1080	Physical, Logical, and Mental Top-Down Effects. <i>Synthese Library</i> , 2021, , 3-37.	0.1	3
1081	Chemotaxis and rhizobacterial biofilm formation in plant-microbe interaction. , 2023, , 71-79.		0
1083	The Pandemic and the Creative Performance of Cities: An Empirical Study in Portugal. <i>Smart Cities</i> , 2023, 6, 445-468.	5.5	1
1084	Nanofluidics at the crossroads. <i>Journal of Chemical Physics</i> , 2023, 158, .	1.2	11



#	ARTICLE	IF	CITATIONS
1086	Time-lapse proteomics unveil constant high exposure of non-antibiotic drug induces synthetic susceptibility towards regular antibiotics. <i>Microbiological Research</i> , 2023, 269, 127320.	2.5	1
1087	The role and mechanism of quorum sensing on environmental antimicrobial resistance. <i>Environmental Pollution</i> , 2023, 322, 121238.	3.7	12
1088	The Two Chemotaxis Gene Clusters of Ensifer alikalisoli YIC4027T, a Symbiont of Sesbania cannabina, Play Different Roles in Chemotaxis and Competitive Nodulation. <i>Agronomy</i> , 2023, 13, 570.	1.3	2
1089	Gut microbiota facilitates adaptation of the plateau zokor ( <i>Myospalax baileyi</i> ) to the plateau living environment. <i>Frontiers in Microbiology</i> , 0, 14, .	1.5	0
1090	Recent structural advances in bacterial chemotaxis signalling. <i>Current Opinion in Structural Biology</i> , 2023, 79, 102565.	2.6	1
1091	Genomic Features Predict Bacterial Life History Strategies in Soil, as Identified by Metagenomic Stable Isotope Probing. <i>MBio</i> , 2023, 14, .	1.8	4
1094	Disentangling $1/f$ noise from confined ion dynamics. <i>Faraday Discussions</i> , 0, 246, 556-575.	1.6	2
1095	The High Penetrability of Nanoparticles into Bacterial Membranes: A Key of a Potential Application. <i>Postepy Mikrobiologii</i> , 2023, 62, 3-11.	0.1	0
1096	Hydrodynamics of Cell Swimming. , 2023, , 32-87.		0
1097	Chemical talk within plant holobiont: A fascinating conversation. , 2023, , 165-203.		0
1099	3e Cognition and Existing Enactive Frameworks. , 2023, , 57-97.		0
1123	Mechanisms of Cr(VI) Reduction by Microorganisms. <i>Environmental Science and Engineering</i> , 2023, , 41-131.	0.1	0