

Marine Microbes See a Sea of Gradients

Science

338, 628-633

DOI: [10.1126/science.1208929](https://doi.org/10.1126/science.1208929)

Citation Report

#	ARTICLE	IF	CITATIONS
2	Seasonality in deep-sea food websâ€”A tribute to the early works of Paul Tyler. Deep-Sea Research Part II: Topical Studies in Oceanography, 2013, 92, 9-17.	0.6	15
3	Bacteria can exploit a flagellar buckling instability to change direction. Nature Physics, 2013, 9, 494-498.	6.5	262
4	Diverse populations of lake water bacteria exhibit chemotaxis towards inorganic nutrients. ISME Journal, 2013, 7, 1661-1664.	4.4	44
5	Chemical ecology of the marine plankton. Natural Product Reports, 2013, 30, 1364.	5.2	20
6	Life in the salinity gradient: Discovering mechanisms behind a new biodiversity pattern. Estuarine, Coastal and Shelf Science, 2013, 135, 317-327.	0.9	138
7	Nitrogen isotope effects induced by anammox bacteria. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 18994-18999.	3.3	174
9	A New Angle on Microscopic Suspension Feeders near Boundaries. Biophysical Journal, 2013, 105, 1796-1804.	0.2	29
11	Nitrogen cycling driven by organic matter export in the South Pacific oxygen minimum zone. Nature Geoscience, 2013, 6, 228-234.	5.4	295
12	Stretching, Coalescence, and Mixing in Porous Media. Physical Review Letters, 2013, 110, 204501.	2.9	117
13	Lineage specific gene family enrichment at the microscale in marine systems. Current Opinion in Microbiology, 2013, 16, 605-617.	2.3	16
14	<i>Prochlorococcus</i> can use the Pro1404 transporter to take up glucose at nanomolar concentrations in the Atlantic Ocean. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 8597-8602.	3.3	72
15	Twelve previously unknown phage genera are ubiquitous in global oceans. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 12798-12803.	3.3	182
16	More mixotrophy in the marine microbial mix. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, 8323-8324.	3.3	27
17	<i>Pseudoalteromonas</i> spp. Serve as Initial Bacterial Attractants in Mesocosms of Coastal Waters but Have Subsequent Antifouling Capacity in Mesocosms and when Embedded in Paint. Applied and Environmental Microbiology, 2013, 79, 6885-6893.	1.4	27
18	Where the genes flow. Nature Geoscience, 2013, 6, 688-690.	5.4	18
19	A Stable-Isotope Mass Spectrometry-Based Metabolic Footprinting Approach to Analyze Exudates from Phytoplankton. Marine Drugs, 2013, 11, 4158-4175.	2.2	17
20	Formation and maintenance of high-nitrate, low pH layers in the eastern Indian Ocean and the role of nitrogen fixation. Biogeosciences, 2013, 10, 5691-5702.	1.3	10
21	Metatranscriptomic and functional metagenomic analysis of methylphosphonate utilization by marine bacteria. Frontiers in Microbiology, 2013, 4, 340.	1.5	63

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22	Virio- and Bacterioplankton Microscale Distributions at the Sediment-Water Interface. PLoS ONE, 2014, 9, e102805.	1.1	19
23	Mechanisms of microbial carbon sequestration in the ocean – future research directions. Biogeosciences, 2014, 11, 5285-5306.	1.3	177
24	Contrasting Strategies of Photosynthetic Energy Utilization Drive Lifestyle Strategies in Ecologically Important Picoeukaryotes. Metabolites, 2014, 4, 260-280.	1.3	44
25	Same same but different: ecological niche partitioning of planktonic freshwater prokaryotes. Journal of Limnology, 2014, 73, .	0.3	52
26	Direct observation of biomixing by vertically migrating zooplankton. Limnology and Oceanography, 2014, 59, 724-732.	1.6	23
27	Metagenomic analysis of size-fractionated picoplankton in a marine oxygen minimum zone. ISME Journal, 2014, 8, 187-211.	4.4	281
28	Environmental Statistics and Optimal Regulation. PLoS Computational Biology, 2014, 10, e1003826.	1.5	20
29	Carbon substrate usage by zooplankton-associated bacteria, phytoplankton-associated bacteria, and free-living bacteria under aerobic and anaerobic conditions. Marine Biology, 2014, 161, 2233-2242.	0.7	10
30	Zooming in to see the bigger picture: Microfluidic and nanofabrication tools to study bacteria. Science, 2014, 346, 1251-1251.	6.0	165
31	The effect of reversals for a stochastic source-seeking process inspired by bacterial chemotaxis. , 2014, , .		0
32	Importance of Saprotrophic Freshwater Fungi for Pollen Degradation. PLoS ONE, 2014, 9, e94643.	1.1	110
33	Perspectives on the microbial carbon pump with special reference to microbial respiration and ecosystem efficiency in large estuarine systems. Biogeosciences, 2014, 11, 3887-3898.	1.3	23
34	Swimming behaviour and magnetotaxis function of the marine bacterium strain MO-1. Environmental Microbiology Reports, 2014, 6, 14-20.	1.0	34
35	Explaining microbial genomic diversity in light of evolutionary ecology. Nature Reviews Microbiology, 2014, 12, 263-273.	13.6	310
36	Freshwater bacterial lifestyles inferred from comparative genomics. Environmental Microbiology, 2014, 16, 746-758.	1.8	31
37	Dissolved organic matter (DOM) release by phytoplankton in the contemporary and future ocean. European Journal of Phycology, 2014, 49, 20-46.	0.9	330
38	Gene-centric approach to integrating environmental genomics and biogeochemical models. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 1879-1884.	3.3	143
39	Zooplankton May Serve as Transmission Vectors for Viruses Infecting Algal Blooms in the Ocean. Current Biology, 2014, 24, 2592-2597.	1.8	48

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40	Solvent immersion imprint lithography. <i>Lab on A Chip</i> , 2014, 14, 2072.	3.1	21
41	How a "pinch of salt" can tune chaotic mixing of colloidal suspensions. <i>Soft Matter</i> , 2014, 10, 4795.	1.2	20
42	Competition "dispersal tradeoff ecologically differentiates recently speciated marine bacterioplankton populations. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2014, 111, 5622-5627.	3.3	187
43	Microbes in beach sands: integrating environment, ecology and public health. <i>Reviews in Environmental Science and Biotechnology</i> , 2014, 13, 329-368.	3.9	127
44	Connecting alveolate cell biology with trophic ecology in the marine plankton using the ciliate <i>Favella</i> as a model. <i>FEMS Microbiology Ecology</i> , 2014, 90, 18-38.	1.3	13
45	Influence of microscale turbulence on the phytoplankton of a temperate coastal embayment, Western Australia. <i>Estuarine, Coastal and Shelf Science</i> , 2014, 145, 80-95.	0.9	16
46	Gastrointestinal Tract Microbiota and Probiotics in Production Animals. <i>Annual Review of Animal Biosciences</i> , 2014, 2, 469-486.	3.6	158
47	Opportunities and challenges in deriving phytoplankton diversity measures from individual trait-based data obtained by scanning flow-cytometry. <i>Frontiers in Microbiology</i> , 2014, 5, 324.	1.5	17
48	A new tool for long-term studies of POM-bacteria interactions: overcoming the century-old Bottle Effect. <i>Scientific Reports</i> , 2015, 5, 14706.	1.6	32
49	Heterotrophic Planktonic Microbes: Virus, Bacteria, Archaea, and Protozoa. , 2015, , 4.2.2-1-4.2.2-34.		8
50	Microbial metabolism of transparent exopolymer particles during the summer months along a eutrophic estuary system. <i>Frontiers in Microbiology</i> , 2015, 6, 403.	1.5	41
51	Seeking sunlight: rapid phototactic motility of filamentous mat-forming cyanobacteria optimize photosynthesis and enhance carbon burial in Lake Huron's submerged sinkholes. <i>Frontiers in Microbiology</i> , 2015, 6, 930.	1.5	27
52	The death mechanism of the harmful algal bloom species <i>Alexandrium tamarense</i> induced by algicidal bacterium <i>Deinococcus</i> sp. Y35. <i>Frontiers in Microbiology</i> , 2015, 6, 992.	1.5	29
53	The Good, the Bad, and the Tiny: A Simple, Mechanistic-Probabilistic Model of Virus-Nutrient Colimitation in Microbes. <i>PLoS ONE</i> , 2015, 10, e0143299.	1.1	3
54	Structure and function of the global ocean microbiome. <i>Science</i> , 2015, 348, 1261359.	6.0	2,137
55	Uncovering hidden worlds of ocean biodiversity. <i>Science</i> , 2015, 348, 865-867.	6.0	47
56	How do divergent ecological strategies emerge among marine bacterioplankton lineages?. <i>Trends in Microbiology</i> , 2015, 23, 577-584.	3.5	65
57	Interaction and signalling between a cosmopolitan phytoplankton and associated bacteria. <i>Nature</i> , 2015, 522, 98-101.	13.7	875

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58	Life under extreme energy limitation: a synthesis of laboratory- and field-based investigations. FEMS Microbiology Reviews, 2015, 39, 688-728.	3.9	288
59	The global ocean microbiome. Science, 2015, 350, aac8455.	6.0	167
60	Live from under the lens: exploring microbial motility with dynamic imaging and microfluidics. Nature Reviews Microbiology, 2015, 13, 761-775.	13.6	134
61	Genomic and transcriptomic evidence for scavenging of diverse organic compounds by widespread deep-sea archaea. Nature Communications, 2015, 6, 8933.	5.8	151
62	Cryptic carbon and sulfur cycling between surface ocean plankton. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 453-457.	3.3	348
63	Rethinking the marine carbon cycle: Factoring in the multifarious lifestyles of microbes. Science, 2015, 347, 1257594.	6.0	679
64	Biotechnological Potential of Marine Microbes. , 2015, , 651-661.		5
65	The physiology and ecological implications of efficient growth. ISME Journal, 2015, 9, 1481-1487.	4.4	155
66	Fundamental shift in vitamin B12 eco-physiology of a model alga demonstrated by experimental evolution. ISME Journal, 2015, 9, 1446-1455.	4.4	65
67	Non-contact fiber-optical trapping of motile bacteria: dynamics observation and energy estimation. Scientific Reports, 2014, 4, 6576.	1.6	38
68	Bacterial motion in narrow capillaries. FEMS Microbiology Ecology, 2015, 91, 1-7.	1.3	7
69	The diatom molecular toolkit to handle nitrogen uptake. Marine Genomics, 2015, 24, 95-108.	0.4	48
70	A functional perspective on phenotypic heterogeneity in microorganisms. Nature Reviews Microbiology, 2015, 13, 497-508.	13.6	709
71	Mapping the Salinity Gradient in a Microfluidic Device with Schlieren Imaging. Sensors, 2015, 15, 11587-11600.	2.1	5
72	Large-Scale ¹³ C Flux Profiling Reveals Conservation of the Entner-Doudoroff Pathway as a Glycolytic Strategy among Marine Bacteria That Use Glucose. Applied and Environmental Microbiology, 2015, 81, 2408-2422.	1.4	73
73	The smell of sex: water-borne and air-borne sex pheromones in the intertidal gastropod Littorina littorea. Journal of Molluscan Studies, 2015, 81, 96-103.	0.4	6
74	Chlorine stress mediates microbial surface attachment in drinking water systems. Applied Microbiology and Biotechnology, 2015, 99, 2861-2869.	1.7	5
75	On uses, misuses and potential abuses of fractal analysis in zooplankton behavioral studies: A review, a critique and a few recommendations. Physica A: Statistical Mechanics and Its Applications, 2015, 432, 410-434.	1.2	13

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76	Generalized receptor law governs phototaxis in the phytoplankton <i>Euglena gracilis</i> . Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 7045-7050.	3.3	60
77	Size-fraction partitioning of community gene transcription and nitrogen metabolism in a marine oxygen minimum zone. ISME Journal, 2015, 9, 2682-2696.	4.4	169
78	Sensitivity of the rate of nutrient uptake by chemotactic bacteria to physical and biological parameters in a turbulent environment. Journal of Theoretical Biology, 2015, 387, 120-135.	0.8	15
79	A Model of Extracellular Enzymes in Free-Living Microbes: Which Strategy Pays Off?. Applied and Environmental Microbiology, 2015, 81, 7385-7393.	1.4	74
80	Characterization of self-generated variants in <i>Pseudoalteromonas lipolytica</i> biofilm with increased antifouling activities. Applied Microbiology and Biotechnology, 2015, 99, 10127-10139.	1.7	39
81	DOM Sources, Sinks, Reactivity, and Budgets. , 2015, , 65-126.		218
82	Reasons Behind the Long-Term Stability of Dissolved Organic Matter. , 2015, , 369-388.		86
83	Microfluidic static droplet array for analyzing microbial communication on a population gradient. Lab on A Chip, 2015, 15, 889-899.	3.1	53
84	Flexibility of bacterial flagella in external shear results in complex swimming trajectories. Journal of the Royal Society Interface, 2015, 12, 20140904.	1.5	27
85	Comparison of bacterial communities on limnic versus coastal marine particles reveals profound differences in colonization. Environmental Microbiology, 2015, 17, 3500-3514.	1.8	148
86	Estuarine ecological structure and functioning. , 2016, , 157-193.		4
87	Identification of Associations between Bacterioplankton and Photosynthetic Picoeukaryotes in Coastal Waters. Frontiers in Microbiology, 2016, 7, 339.	1.5	26
88	Experimental Identification of Small Non-Coding RNAs in the Model Marine Bacterium <i>Ruegeria pomeroyi</i> DSS-3. Frontiers in Microbiology, 2016, 7, 380.	1.5	14
89	Genetic Manipulation of Competition for Nitrate between Heterotrophic Bacteria and Diatoms. Frontiers in Microbiology, 2016, 7, 880.	1.5	55
90	Species Divergence vs. Functional Convergence Characterizes Crude Oil Microbial Community Assembly. Frontiers in Microbiology, 2016, 7, 1254.	1.5	24
91	Seasonal Succession of Free-Living Bacterial Communities in Coastal Waters of the Western Antarctic Peninsula. Frontiers in Microbiology, 2016, 7, 1731.	1.5	53
92	Distributions of Virus-Like Particles and Prokaryotes within Microenvironments. PLoS ONE, 2016, 11, e0146984.	1.1	20
93	The Role of Adaptation in Bacterial Speed Races. PLoS Computational Biology, 2016, 12, e1004974.	1.5	24

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94	How mutualisms arise in phytoplankton communities: building eco-evolutionary principles for aquatic microbes. <i>Ecology Letters</i> , 2016, 19, 810-822.	3.0	75
95	Native plasmids restrict growth of <i>Phaeobacter inhibens</i> DSM 17395: Energetic costs of plasmids assessed by quantitative physiological analyses. <i>Environmental Microbiology</i> , 2016, 18, 4817-4829.	1.8	34
96	Response of bacterial communities from California coastal waters to alginate particles and an alginolytic <i>Alteromonas macleodii</i> strain. <i>Environmental Microbiology</i> , 2016, 18, 4369-4377.	1.8	40
97	Inhomogeneous distribution of <i>Chlamydomonas</i> in a cylindrical container with a bubble plume. <i>Biology Open</i> , 2016, 5, 154-160.	0.6	8
98	Rapid expulsion of microswimmers by a vortical flow. <i>Nature Communications</i> , 2016, 7, 11114.	5.8	33
99	The Perfect Slime: Microbial Extracellular Polymeric Substances (EPS). <i>Water Intelligence Online</i> , 2016, 15, 9781780407425-9781780407425.	0.3	30
100	Nutrient uptake in a suspension of squirmers. <i>Journal of Fluid Mechanics</i> , 2016, 789, 481-499.	1.4	10
101	Evidence for quorum sensing and differential metabolite production by a marine bacterium in response to DMSP. <i>ISME Journal</i> , 2016, 10, 2304-2316.	4.4	112
102	Insensitivity of Diverse and Temporally Variable Particle-Associated Microbial Communities to Bulk Seawater Environmental Parameters. <i>Applied and Environmental Microbiology</i> , 2016, 82, 3431-3437.	1.4	70
103	Deciphering ocean carbon in a changing world. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, 3143-3151.	3.3	253
104	Bacterioplankton niche partitioning in the use of phytoplankton-derived dissolved organic carbon: quantity is more important than quality. <i>ISME Journal</i> , 2016, 10, 2582-2592.	4.4	77
105	Growth rates of common pelagic ciliates in a highly eutrophic lake measured with a modified dilution method. <i>Oceanological and Hydrobiological Studies</i> , 2016, 45, 216-229.	0.3	3
106	Geographic Impact on Genomic Divergence as Revealed by Comparison of Nine Citromicrobial Genomes. <i>Applied and Environmental Microbiology</i> , 2016, 82, 7205-7216.	1.4	9
107	Natural search algorithms as a bridge between organisms, evolution, and ecology. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, 9413-9420.	3.3	44
108	Virus ecology of fluvial systems: a blank spot on the map?. <i>Biological Reviews</i> , 2016, 91, 937-949.	4.7	30
109	Microbial Morphology and Motility as Biosignatures for Outer Planet Missions. <i>Astrobiology</i> , 2016, 16, 755-774.	1.5	34
110	Synthetic microbial ecology and the dynamic interplay between microbial genotypes. <i>FEMS Microbiology Reviews</i> , 2016, 40, 961-979.	3.9	70
111	First Evidence of <i>Altererythrobacter</i> sp. LY02 with Indirect Algicidal Activity on the Toxic Dinoflagellate, <i>Alexandrium tamarense</i> . <i>Current Microbiology</i> , 2016, 73, 550-560.	1.0	9

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112	Linking biochemical properties of particles to particle-attached and free-living bacterial community structure along the particle density gradient from freshwater to open ocean. <i>Journal of Geophysical Research G: Biogeosciences</i> , 2016, 121, 2261-2274.	1.3	73
113	Fluid dynamic constraints on resource acquisition in small pelagic organisms. <i>European Physical Journal: Special Topics</i> , 2016, 225, 669-683.	1.2	13
114	Lagrangian model of copepod dynamics: Clustering by escape jumps in turbulence. <i>Physical Review E</i> , 2016, 93, 043117.	0.8	9
115	Bacterial lipids activate, synergize, and inhibit a developmental switch in choanoflagellates. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, 7894-7899.	3.3	120
116	Small bugs with a big impact: linking plankton ecology with ecosystem processes. <i>Journal of Plankton Research</i> , 2016, 38, 1036-1043.	0.8	31
117	Bacterial evolution: Genomics of metabolic trade-offs. <i>Nature Microbiology</i> , 2016, 1, 16181.	5.9	45
118	Automated Chemotactic Sorting and Single-cell Cultivation of Microbes using Droplet Microfluidics. <i>Scientific Reports</i> , 2016, 6, 24192.	1.6	36
119	Attached biofilms and suspended aggregates are distinct microbial lifestyles emanating from differing hydraulics. <i>Nature Microbiology</i> , 2016, 1, 16178.	5.9	60
120	Microbial Community Dynamics in Two Polar Extremes: The Lakes of the McMurdo Dry Valleys and the West Antarctic Peninsula Marine Ecosystem. <i>BioScience</i> , 2016, 66, 829-847.	2.2	31
121	What is so Special About Marine Microorganisms? Introduction to the Marine Microbiome-From Diversity to Biotechnological Potential. , 2016, , 3-20.		6
122	Microfluidic Studies of Biofilm Formation in Dynamic Environments. <i>Journal of Bacteriology</i> , 2016, 198, 2589-2595.	1.0	71
123	Chemotaxis toward phytoplankton drives organic matter partitioning among marine bacteria. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, 1576-1581.	3.3	220
124	Bacterial predator-prey dynamics in microscale patchy landscapes. <i>Proceedings of the Royal Society B: Biological Sciences</i> , 2016, 283, 20152154.	1.2	46
125	High-throughput determination of dissolved free amino acids in unconcentrated freshwater by ion-pairing liquid chromatography and mass spectrometry. <i>Journal of Chromatography A</i> , 2016, 1440, 85-93.	1.8	15
126	Physical limits on bacterial navigation in dynamic environments. <i>Journal of the Royal Society Interface</i> , 2016, 13, 20150844.	1.5	24
127	Selective silicate-directed motility in diatoms. <i>Nature Communications</i> , 2016, 7, 10540.	5.8	72
128	Microbial Surface Colonization and Biofilm Development in Marine Environments. <i>Microbiology and Molecular Biology Reviews</i> , 2016, 80, 91-138.	2.9	864
129	Organic Matter Loading Modifies the Microbial Community Responsible for Nitrogen Loss in Estuarine Sediments. <i>Microbial Ecology</i> , 2016, 71, 555-565.	1.4	20

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130	Regulation of infection efficiency in a globally abundant marine <i>Bacteriodes</i> virus. <i>ISME Journal</i> , 2017, 11, 284-295.	4.4	40
131	Scalar gradients in stirred mixtures and the deconstruction of random fields. <i>Journal of Fluid Mechanics</i> , 2017, 812, 578-610.	1.4	18
132	Microscale reservoir effects on microbial sulfur isotope fractionation. <i>Geochimica Et Cosmochimica Acta</i> , 2017, 203, 117-139.	1.6	8
133	Microbial Strategies for Oil Biodegradation. , 2017, , 19-39.		15
134	Evidence for environmental and ecological selection in a microbe with no geographic limits to gene flow. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, 2651-2656.	3.3	68
135	Large-scale seaweed cultivation diverges water and sediment microbial communities in the coast of Nan'ao Island, South China Sea. <i>Science of the Total Environment</i> , 2017, 598, 97-108.	3.9	49
136	Natural resource landscapes of a marine bacterium reveal distinct fitness-determining genes across the genome. <i>Environmental Microbiology</i> , 2017, 19, 2422-2433.	1.8	8
137	Persistence, loss and appearance of bacteria upstream and downstream of a river system. <i>Marine and Freshwater Research</i> , 2017, 68, 851.	0.7	11
138	Spatiotemporal dynamics of bacterial community composition in large shallow eutrophic Lake Taihu: High overlap between free-living and particle-attached assemblages. <i>Limnology and Oceanography</i> , 2017, 62, 1366-1382.	1.6	101
139	Finding patches in a heterogeneous aquatic environment: pH-taxis by the dispersal stage of choanoflagellates. <i>Limnology and Oceanography Letters</i> , 2017, 2, 37-46.	1.6	19
140	Marine diatoms change their gene expression profile when exposed to microscale turbulence under nutrient replete conditions. <i>Scientific Reports</i> , 2017, 7, 3826.	1.6	27
141	A Diverse Community To Study Communities: Integration of Experiments and Mathematical Models To Study Microbial Consortia. <i>Journal of Bacteriology</i> , 2017, 199, .	1.0	33
142	Success of chemolithoautotrophic SUP05 and <i>Sulfurimonas</i> GD17 cells in pelagic Baltic Sea redox zones is facilitated by their lifestyles as <i>K</i> and <i>r</i> -strategists. <i>Environmental Microbiology</i> , 2017, 19, 2495-2506.	1.8	26
143	Zooming in on the phycosphere: the ecological interface for phytoplankton-bacteria relationships. <i>Nature Microbiology</i> , 2017, 2, 17065.	5.9	727
144	Flagella bending affects macroscopic properties of bacterial suspensions. <i>Journal of the Royal Society Interface</i> , 2017, 14, 20161031.	1.5	10
145	Competition and niche separation of pelagic bacteria in freshwater habitats. <i>Environmental Microbiology</i> , 2017, 19, 2133-2150.	1.8	50
146	Modeling of active swimmer suspensions and their interactions with the environment. <i>Soft Matter</i> , 2017, 13, 6033-6050.	1.2	20
147	Dissemination and loss of a biofilm-related genomic island in marine <i>Pseudoalteromonas</i> mediated by integrative and conjugative elements. <i>Environmental Microbiology</i> , 2017, 19, 4620-4637.	1.8	10

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148	Differences in free-living and particle-associated bacterial communities and their spatial variation in Kongsfjorden, Arctic. <i>Journal of Basic Microbiology</i> , 2017, 57, 827-838.	1.8	49
149	Phototaxis beyond turning: persistent accumulation and response acclimation of the microalga <i>Chlamydomonas reinhardtii</i> . <i>Scientific Reports</i> , 2017, 7, 3447.	1.6	44
150	Autonomous reciprocating migration of an active material. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, 8704-8709.	3.3	23
151	How microbes survive in the open ocean. <i>Science</i> , 2017, 357, 646-647.	6.0	33
152	Influence of pulsed and continuous substrate inputs on freshwater bacterial community composition and functioning in bioreactors. <i>Environmental Microbiology</i> , 2017, 19, 5078-5087.	1.8	7
153	Spatial variability of marine bacterial and archaeal communities along the particulate matter continuum. <i>Molecular Ecology</i> , 2017, 26, 6827-6840.	2.0	42
154	Ureolytic Activity and Its Regulation in <i>Vibrio campbellii</i> and <i>Vibrio harveyi</i> in Relation to Nitrogen Recovery from Human Urine. <i>Environmental Science & Technology</i> , 2017, 51, 13335-13343.	4.6	8
155	A dynamic energy budget (DEB) model to describe population dynamics of the marine cyanobacterium <i>Prochlorococcus marinus</i> . <i>Ecological Modelling</i> , 2017, 359, 320-332.	1.2	13
156	Stochastic gene expression: bacterial elites in chemotaxis. <i>Molecular Systems Biology</i> , 2017, 13, 909.	3.2	4
157	Probing the evolution, ecology and physiology of marine protists using transcriptomics. <i>Nature Reviews Microbiology</i> , 2017, 15, 6-20.	13.6	176
158	Ubiquitous marine bacterium inhibits diatom cell division. <i>ISME Journal</i> , 2017, 11, 31-42.	4.4	98
159	Statistical signatures of a targeted search by bacteria. <i>Physical Biology</i> , 2017, 14, 065002.	0.8	0
160	Search efficiency of biased migration towards stationary or moving targets in heterogeneously structured environments. <i>Physical Review E</i> , 2017, 96, 062415.	0.8	4
161	Trajectories and Drivers of Genome Evolution in Surface-Associated Marine Phaeobacter. <i>Genome Biology and Evolution</i> , 2017, 9, 3297-3311.	1.1	13
162	Fine-scale spatial patterns in microbial community composition in an acid mine drainage. <i>FEMS Microbiology Ecology</i> , 2017, 93, .	1.3	5
163	Dynamics of the Bacterial Community Associated with <i>Phaeodactylum tricornutum</i> Cultures. <i>Processes</i> , 2017, 5, 77.	1.3	25
164	Sustaining Rare Marine Microorganisms: Macroorganisms As Repositories and Dispersal Agents of Microbial Diversity. <i>Frontiers in Microbiology</i> , 2017, 8, 947.	1.5	66
165	Single-Cell Growth Rates in Photoautotrophic Populations Measured by Stable Isotope Probing and Resonance Raman Microspectrometry. <i>Frontiers in Microbiology</i> , 2017, 8, 1449.	1.5	21

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166	From Genes to Ecosystems in Microbiology: Modeling Approaches and the Importance of Individuality. <i>Frontiers in Microbiology</i> , 2017, 8, 2299.	1.5	37
167	Feedback between motion and sensation provides nonlinear boost in run-and-tumble navigation. <i>PLoS Computational Biology</i> , 2017, 13, e1005429.	1.5	36
168	Behavioral Variability and Phenotypic Diversity in Bacterial Chemotaxis. <i>Annual Review of Biophysics</i> , 2018, 47, 595-616.	4.5	54
169	Low-temperature chemotaxis, halotaxis and chemohalotaxis by the psychrophilic marine bacterium <i>Colwellia psychrerythraea</i> 34H. <i>Environmental Microbiology Reports</i> , 2018, 10, 92-101.	1.0	12
170	Mixing it up in the ocean carbon cycle and the removal of refractory dissolved organic carbon. <i>Scientific Reports</i> , 2018, 8, 2542.	1.6	81
171	Benefit from decline: the primary transcriptome of <i>Alteromonas macleodii</i> str. Te101 during <i>Trichodesmium</i> demise. <i>ISME Journal</i> , 2018, 12, 981-996.	4.4	30
172	High resolution time series reveals cohesive but short-lived communities in coastal plankton. <i>Nature Communications</i> , 2018, 9, 266.	5.8	122
173	Evidence for ubiquitous preferential particle orientation in representative oceanic shear flows. <i>Limnology and Oceanography</i> , 2018, 63, 122-143.	1.6	43
174	Lessons from simple marine models on the bacterial regulation of eukaryotic development. <i>Current Opinion in Microbiology</i> , 2018, 43, 108-116.	2.3	33
175	Influence of Chemotaxis and Swimming Patterns on the Virulence of the Coral Pathogen <i>Vibrio coralliilyticus</i> . <i>Journal of Bacteriology</i> , 2018, 200, .	1.0	26
176	Microdiversification in genome-streamlined ubiquitous freshwater Actinobacteria. <i>ISME Journal</i> , 2018, 12, 185-198.	4.4	227
177	Magnetotaxis Enables Magnetotactic Bacteria to Navigate in Flow. <i>Small</i> , 2018, 14, 1702982.	5.2	27
178	Dynamics of Heterotrophic Bacterial Assemblages within <i>Synechococcus</i> Cultures. <i>Applied and Environmental Microbiology</i> , 2018, 84, .	1.4	52
179	Microbial Communities in the East and West Fram Strait During Sea Ice Melting Season. <i>Frontiers in Marine Science</i> , 2018, 5, .	1.2	53
180	Diversity and community structure of marine microbes around the Benham Rise underwater plateau, northeastern Philippines. <i>PeerJ</i> , 2018, 6, e4781.	0.9	19
181	Environmental Drivers of Free-Living vs. Particle-Attached Bacterial Community Composition in the Mauritania Upwelling System. <i>Frontiers in Microbiology</i> , 2018, 9, 2836.	1.5	57
182	Quantifying Inorganic Nitrogen Assimilation by <i>Synechococcus</i> Using Bulk and Single-Cell Mass Spectrometry: A Comparative Study. <i>Frontiers in Microbiology</i> , 2018, 9, 2847.	1.5	6
183	Synthesis and degradation of FtsZ quantitatively predict the first cell division in starved bacteria. <i>Molecular Systems Biology</i> , 2018, 14, e8623.	3.2	66

#	ARTICLE	IF	CITATIONS
184	The Life Aquatic at the Microscale. <i>MSystems</i> , 2018, 3, .	1.7	3
185	Microbial micropatches within microbial hotspots. <i>PLoS ONE</i> , 2018, 13, e0197224.	1.1	6
186	Mineral Facilitated Horizontal Gene Transfer: A New Principle for Evolution of Life?. <i>Frontiers in Microbiology</i> , 2018, 9, 2217.	1.5	19
187	Organic Particles: Heterogeneous Hubs for Microbial Interactions in Aquatic Ecosystems. <i>Frontiers in Microbiology</i> , 2018, 9, 2569.	1.5	51
188	Fast Potentiometric CO ₂ Sensor for High-Resolution in Situ Measurements in Fresh Water Systems. <i>Environmental Science & Technology</i> , 2018, 52, 11259-11266.	4.6	19
189	Heterotrophic substrate specificity in the aquatic environment: The role of microscale patchiness investigated using modelling. <i>Environmental Microbiology</i> , 2018, 20, 3825-3835.	1.8	5
190	Marine Biofilms: A Successful Microbial Strategy With Economic Implications. <i>Frontiers in Marine Science</i> , 2018, 5, .	1.2	214
191	The Bacterial Symbiont <i>Phaeobacter inhibens</i> Shapes the Life History of Its Algal Host <i>Emiliania huxleyi</i> . <i>Frontiers in Marine Science</i> , 2018, 5, .	1.2	17
192	Microbial Community Structure–Function Relationships in Yaquina Bay Estuary Reveal Spatially Distinct Carbon and Nitrogen Cycling Capacities. <i>Frontiers in Microbiology</i> , 2018, 9, 1282.	1.5	48
193	Synchrony of Eukaryotic and Prokaryotic Planktonic Communities in Three Seasonally Sampled Austrian Lakes. <i>Frontiers in Microbiology</i> , 2018, 9, 1290.	1.5	26
194	Comprehensive assessment of microbial aggregation characteristics of activated sludge bioreactors using fuzzy clustering analysis. <i>Ecotoxicology and Environmental Safety</i> , 2018, 162, 296-303.	2.9	5
195	Theoretical Insight into the Biodegradation of Solitary Oil Microdroplets Moving through a Water Column. <i>Bioengineering</i> , 2018, 5, 15.	1.6	5
196	Heat or mass transport from drops in shearing flows. Part 1. The open-streamline regime. <i>Journal of Fluid Mechanics</i> , 2018, 850, 439-483.	1.4	7
197	A Cobalamin Activity-Based Probe Enables Microbial Cell Growth and Finds New Cobalamin-Protein Interactions across Domains. <i>Applied and Environmental Microbiology</i> , 2018, 84, .	1.4	15
198	Microscale ecology regulates particulate organic matter turnover in model marine microbial communities. <i>Nature Communications</i> , 2018, 9, 2743.	5.8	107
199	Attachment between heterotrophic bacteria and microalgae influences symbiotic microscale interactions. <i>Environmental Microbiology</i> , 2018, 20, 4385-4400.	1.8	55
200	Mini-review: Phytoplankton-derived polysaccharides in the marine environment and their interactions with heterotrophic bacteria. <i>Environmental Microbiology</i> , 2018, 20, 2671-2685.	1.8	197
201	Combined influence of hydrodynamics and chemotaxis in the distribution of microorganisms around spherical nutrient sources. <i>Physical Review E</i> , 2018, 98, 012419.	0.8	9

#	ARTICLE	IF	CITATIONS
202	Coral Food, Feeding, Nutrition, and Secretion: A Review. Results and Problems in Cell Differentiation, 2018, 65, 377-421.	0.2	23
203	Viral and metabolic controls on high rates of microbial sulfur and carbon cycling in wetland ecosystems. Microbiome, 2018, 6, 138.	4.9	63
204	Simulations of Brownian tracer transport in squirmer suspensions. IMA Journal of Applied Mathematics, 2018, 83, 680-699.	0.8	11
205	Dispersal-competition tradeoff in microbiomes in the quest for land colonization. Scientific Reports, 2018, 8, 9451.	1.6	15
206	Methanogenic archaea associated to Microcystis sp. in field samples and in culture. Hydrobiologia, 2019, 831, 163-172.	1.0	10
207	Microbial Communities. , 2019, , 126-134.		8
208	Causes of maladaptation. Evolutionary Applications, 2019, 12, 1229-1242.	1.5	85
209	Biofilm formation as a microbial strategy to assimilate particulate substrates. Environmental Microbiology Reports, 2019, 11, 749-764.	1.0	20
210	Modulation of hydrolytic profiles of cell-bound and cell-free exoenzymes in Antarctic marine bacterial isolates. Advances in Oceanography and Limnology, 2019, 10, .	0.2	0
211	Proteorhodopsin Overproduction Enhances the Long-Term Viability of Escherichia coli. Applied and Environmental Microbiology, 2019, 86, .	1.4	12
212	Insight into adaptation mechanisms of marine bacterioplankton from comparative genomic analysis of the genus Pseudohongiella. Deep-Sea Research Part II: Topical Studies in Oceanography, 2019, 167, 62-69.	0.6	5
213	Fast and accurate average genome size and 16S rRNA gene average copy number computation in metagenomic data. BMC Bioinformatics, 2019, 20, 453.	1.2	15
214	Uncovering microbial inter-domain interactions in complex communities. Philosophical Transactions of the Royal Society B: Biological Sciences, 2019, 374, 20190087.	1.8	4
215	Higher contribution of globally rare bacterial taxa reflects environmental transitions across the surface ocean. Molecular Ecology, 2019, 28, 1930-1945.	2.0	41
216	Unique Patterns and Biogeochemical Relevance of Two-Component Sensing in Marine Bacteria. MSystems, 2019, 4, .	1.7	29
217	Microbial indicators of environmental perturbations in coral reef ecosystems. Microbiome, 2019, 7, 94.	4.9	126
218	Can diatom girdle band pores act as a hydrodynamic viral defense mechanism?. Journal of Biological Physics, 2019, 45, 213-234.	0.7	7
219	Comparison of bacterial community structure and potential functions in hypoxic and non-hypoxic zones of the Changjiang Estuary. PLoS ONE, 2019, 14, e0217431.	1.1	33

#	ARTICLE	IF	CITATIONS
220	Bacteriaâ€”paper, a versatile platform to study bacterial ecology. <i>Ecology Letters</i> , 2019, 22, 1316-1323.	3.0	6
221	The Structure and Function of Aquatic Microbial Communities. <i>Advances in Environmental Microbiology</i> , 2019, , .	0.1	2
222	Relationship Between Lifestyle and Structure of Bacterial Communities and Their Functionality in Aquatic Systems. <i>Advances in Environmental Microbiology</i> , 2019, , 13-52.	0.1	12
223	Bacteria push the limits of chemotactic precision to navigate dynamic chemical gradients. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019, 116, 10792-10797.	3.3	41
224	Bacterial scattering in microfluidic crystal flows reveals giant active Taylorâ€”Aris dispersion. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019, 116, 11119-11124.	3.3	52
225	Linking heterotrophic bacterioplankton community composition to the optical dynamics of dissolved organic matter in a large eutrophic Chinese lake. <i>Science of the Total Environment</i> , 2019, 679, 136-147.	3.9	35
226	Contrasting Controls on Microzooplankton Grazing and Viral Infection of Microbial Prey. <i>Frontiers in Marine Science</i> , 2019, 6, .	1.2	21
227	Bacterial chemotaxis in a microfluidic T-maze reveals strong phenotypic heterogeneity in chemotactic sensitivity. <i>Nature Communications</i> , 2019, 10, 1877.	5.8	74
228	Fungal Community Composition and Potential Depth-Related Driving Factors Impacting Distribution Pattern and Trophic Modes from Epi- to Abyssopelagic Zones of the Western Pacific Ocean. <i>Microbial Ecology</i> , 2019, 78, 820-831.	1.4	31
229	An automated Raman-based platform for the sorting of live cells by functional properties. <i>Nature Microbiology</i> , 2019, 4, 1035-1048.	5.9	170
230	Dispersal homogenizes communities via immigration even at low rates in a simplified synthetic bacterial metacommunity. <i>Nature Communications</i> , 2019, 10, 1314.	5.8	47
231	Nitrate and ammonium fluxes to diatoms and dinoflagellates at a single cell level in mixed field communities in the sea. <i>Scientific Reports</i> , 2019, 9, 1424.	1.6	33
232	Editorial: The Responses of Marine Microorganisms, Communities and Ecofunctions to Environmental Gradients. <i>Frontiers in Microbiology</i> , 2019, 10, 115.	1.5	12
233	Effects of elevated carbon dioxide on environmental microbes and its mechanisms: A review. <i>Science of the Total Environment</i> , 2019, 655, 865-879.	3.9	69
234	Community dynamics of free-living and particle-attached bacteria following a reservoir <i>Microcystis</i> bloom. <i>Science of the Total Environment</i> , 2019, 660, 501-511.	3.9	107
235	Modelling the complexity of plankton communities exploiting omics potential: From present challenges to an integrative pipeline. <i>Current Opinion in Systems Biology</i> , 2019, 13, 68-74.	1.3	27
236	Selective chemoattraction of the benthic diatom <i>Seminavis robusta</i> to phosphate but not to inorganic nitrogen sources contributes to biofilm structuring. <i>MicrobiologyOpen</i> , 2019, 8, e00694.	1.2	13
237	Decision-making of the benthic diatom <i>Seminavis robusta</i> searching for inorganic nutrients and pheromones. <i>ISME Journal</i> , 2019, 13, 537-546.	4.4	16

#	ARTICLE	IF	CITATIONS
238	Genome-scale fitness profile of <i>Caulobacter crescentus</i> grown in natural freshwater. ISME Journal, 2019, 13, 523-536.	4.4	35
239	<i>Sulfurimonas</i> subgroup GD17 cells accumulate polyphosphate under fluctuating redox conditions in the Baltic Sea: possible implications for their ecology. ISME Journal, 2019, 13, 482-493.	4.4	8
240	The role of sedimentation in the structuring of microbial communities in biofloc-dominated aquaculture tanks. Aquaculture, 2020, 514, 734493.	1.7	14
241	Patterns and processes of free-living and particle-associated bacterioplankton and archaeoplankton communities in a subtropical river-bay system in South China. Limnology and Oceanography, 2020, 65, S161.	1.6	48
242	Environmental drivers of metabolic heterogeneity in clonal microbial populations. Current Opinion in Biotechnology, 2020, 62, 202-211.	3.3	40
243	Labile Dissolved Organic Matter Compound Characteristics Select for Divergence in Marine Bacterial Activity and Transcription. Frontiers in Microbiology, 2020, 11, 588778.	1.5	26
244	Trophic Interactions and the Drivers of Microbial Community Assembly. Current Biology, 2020, 30, R1176-R1188.	1.8	165
245	Guiding Bacterial Activity for Biofabrication of Complex Materials via Controlled Wetting of Superhydrophobic Surfaces. ACS Nano, 2020, 14, 12929-12937.	7.3	23
246	Functional Seasonality of Free-Living and Particle-Associated Prokaryotic Communities in the Coastal Adriatic Sea. Frontiers in Microbiology, 2020, 11, 584222.	1.5	9
247	Antioxidant Molecules from Marine Fungi: Methodologies and Perspectives. Antioxidants, 2020, 9, 1183.	2.2	39
248	Migratory Zooplankton Excreta and Its Influence on Prokaryotic Communities. Frontiers in Marine Science, 2020, 7, .	1.2	23
249	Adaptive tuning of cell sensory diversity without changes in gene expression. Science Advances, 2020, 6, .	4.7	21
250	Cutting Through the Noise: Bacterial Chemotaxis in Marine Microenvironments. Frontiers in Marine Science, 2020, 7, .	1.2	12
251	Biophysical methods to quantify bacterial behaviors at oil-water interfaces. Journal of Industrial Microbiology and Biotechnology, 2020, 47, 725-738.	1.4	11
252	Brazilian Deep-Sea Biodiversity. Brazilian Marine Biodiversity, 2020, , .	0.4	6
253	Self-propelling and rolling of a sessile-motile aggregate of the bacterium <i>Caulobacter crescentus</i> . Communications Biology, 2020, 3, 587.	2.0	7
254	Constrained optimal foraging by marine bacterioplankton on particulate organic matter. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 25571-25579.	3.3	25
255	Quorum sensing regulates "swim" and "stick" lifestyle in the phycosphere. Environmental Microbiology, 2020, 22, 4761-4778.	1.8	43

#	ARTICLE	IF	CITATIONS
256	Diversity of Pelagic and Benthic Bacterial Assemblages in the Western Pacific Ocean. <i>Frontiers in Microbiology</i> , 2020, 11, 1730.	1.5	9
257	Cryptic speciation of a pelagic <i>Roseobacter</i> population varying at a few thousand nucleotide sites. <i>ISME Journal</i> , 2020, 14, 3106-3119.	4.4	11
258	Not That Close to Mommy: Horizontal Transmission Seeds the Microbiome Associated with the Marine Sponge <i>Plakina cyanorosea</i> . <i>Microorganisms</i> , 2020, 8, 1978.	1.6	11
259	An ultraviolet dye-graph for measuring the chemical disturbances of sinking particles and swimming plankton. <i>Limnology and Oceanography: Methods</i> , 2020, 18, 707-716.	1.0	0
260	Redox-informed models of global biogeochemical cycles. <i>Nature Communications</i> , 2020, 11, 5680.	5.8	26
261	Linking Spatial and Temporal Dynamic of Bacterioplankton Communities With Ecological Strategies Across a Coastal Frontal Area. <i>Frontiers in Marine Science</i> , 2020, 7, .	1.2	7
262	Stretching and folding sustain microscale chemical gradients in porous media. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2020, 117, 13359-13365.	3.3	32
263	Imprint of Trace Dissolved Oxygen on Prokaryoplankton Community Structure in an Oxygen Minimum Zone. <i>Frontiers in Marine Science</i> , 2020, 7, .	1.2	9
264	Auxotrophic interactions: a stabilizing attribute of aquatic microbial communities?. <i>FEMS Microbiology Ecology</i> , 2020, 96, .	1.3	31
265	In Situ Chemotaxis Assay to Examine Microbial Behavior in Aquatic Ecosystems. <i>Journal of Visualized Experiments</i> , 2020, , .	0.2	10
266	The Role of Biofilms Developed under Different Anthropogenic Pressure on Recruitment of Macro-Invertebrates. <i>International Journal of Molecular Sciences</i> , 2020, 21, 2030.	1.8	18
267	Factors shaping community patterns of protists and bacteria on a European scale. <i>Environmental Microbiology</i> , 2020, 22, 2243-2260.	1.8	49
268	The ecology of heterogeneity: soil bacterial communities and C dynamics. <i>Philosophical Transactions of the Royal Society B: Biological Sciences</i> , 2020, 375, 20190249.	1.8	76
269	Homeostatic regulation of dissolved labile organic substrates by consumption and release processes in a freshwater lake. <i>Limnology and Oceanography</i> , 2020, 65, 939-950.	1.6	2
270	Salty sensors, fresh ideas: The use of molecular and imaging sensors in understanding plankton dynamics across marine and freshwater ecosystems. <i>Limnology and Oceanography Letters</i> , 2020, 5, 169-184.	1.6	11
271	Phenotypic variation in spatially structured microbial communities: ecological origins and consequences. <i>Current Opinion in Biotechnology</i> , 2020, 62, 220-227.	3.3	8
272	Biofilms at interfaces: microbial distribution in floating films. <i>Soft Matter</i> , 2020, 16, 1731-1750.	1.2	16
273	Mechanobiology: how bacteria sense and respond to forces. <i>Nature Reviews Microbiology</i> , 2020, 18, 227-240.	13.6	171

#	ARTICLE	IF	CITATIONS
274	Generating Controlled, Dynamic Chemical Landscapes to Study Microbial Behavior. <i>Journal of Visualized Experiments</i> , 2020, , .	0.2	2
275	Comparative analysis of free-living and particle-associated bacterial communities of Lake Baikal during the ice-covered period. <i>Journal of Great Lakes Research</i> , 2020, 46, 508-518.	0.8	14
276	Cellular memory enhances bacterial chemotactic navigation in rugged environments. <i>Communications Physics</i> , 2020, 3, .	2.0	14
277	Phytoplankton Orientation in a Turbulent Ocean: A Microscale Perspective. <i>Frontiers in Marine Science</i> , 2020, 7, .	1.2	18
278	Single-cell bacterial transcription measurements reveal the importance of dimethylsulfoniopropionate (DMSP) hotspots in ocean sulfur cycling. <i>Nature Communications</i> , 2020, 11, 1942.	5.8	30
279	How can microbial population genomics inform community ecology?. <i>Philosophical Transactions of the Royal Society B: Biological Sciences</i> , 2020, 375, 20190253.	1.8	27
280	Bacterial Glycogen Provides Short-Term Benefits in Changing Environments. <i>Applied and Environmental Microbiology</i> , 2020, 86, .	1.4	53
281	Human neutrophils swim and phagocytise bacteria. <i>Biology of the Cell</i> , 2021, 113, 28-38.	0.7	9
282	Chemotaxis under flow disorder shapes microbial dispersion in porous media. <i>Nature Physics</i> , 2021, 17, 68-73.	6.5	46
283	Foraging trade-offs, flagellar arrangements, and flow architecture of planktonic protists. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2021, 118, .	3.3	20
284	Environmental influences shaping microbial communities in low oxygen, highly stratified marine embayment. <i>Aquatic Microbial Ecology</i> , 0, , .	0.9	6
285	Microbial diversity of co-occurring heterotrophs in cultures of marine picocyanobacteria. <i>Environmental Microbiomes</i> , 2021, 16, 1.	2.2	28
286	Translating New Synthetic Biology Advances for Biosensing Into the Earth and Environmental Sciences. <i>Frontiers in Microbiology</i> , 2020, 11, 618373.	1.5	40
287	Environmental Features of Freshwater Planktonic Actinobacteria. <i>Contemporary Problems of Ecology</i> , 2021, 14, 158-170.	0.3	13
288	Active carpets drive non-equilibrium diffusion and enhanced molecular fluxes. <i>Nature Communications</i> , 2021, 12, 1906.	5.8	14
289	Sperm chemotaxis in marine species is optimal at physiological flow rates according theory of filament surfing. <i>PLoS Computational Biology</i> , 2021, 17, e1008826.	1.5	10
292	Spatial patterns of ectoenzymatic kinetics in relation to biogeochemical properties in the Mediterranean Sea and the concentration of the fluorogenic substrate used. <i>Biogeosciences</i> , 2021, 18, 2301-2323.	1.3	6
293	Particle Collection in Imhoff Sedimentation Cones Enriches Both Motile Chemotactic and Particle-Attached Bacteria. <i>Frontiers in Microbiology</i> , 2021, 12, 643730.	1.5	9

#	ARTICLE	IF	CITATIONS
294	Viscophobic turning dictates microalgae transport in viscosity gradients. <i>Nature Physics</i> , 2021, 17, 926-930.	6.5	25
295	Physical Constraints on Motility with Applications to Possible Life on Mars and Enceladus. <i>Planetary Science Journal</i> , 2021, 2, 101.	1.5	2
297	Sweet spheres: succession and <scp>CAZyme</scp> expression of marine bacterial communities colonizing a mix of alginate and pectin particles. <i>Environmental Microbiology</i> , 2021, 23, 3130-3148.	1.8	17
298	Small sinking particles control anammox rates in the Peruvian oxygen minimum zone. <i>Nature Communications</i> , 2021, 12, 3235.	5.8	33
300	Olfactory navigation in the real world: Simple local search strategies for turbulent environments. <i>Journal of Theoretical Biology</i> , 2021, 516, 110607.	0.8	3
301	A distinct growth physiology enhances bacterial growth under rapid nutrient fluctuations. <i>Nature Communications</i> , 2021, 12, 3662.	5.8	40
302	The Seasonal Flux and Fate of Dissolved Organic Carbon Through Bacterioplankton in the Western North Atlantic. <i>Frontiers in Microbiology</i> , 2021, 12, 669883.	1.5	14
303	Enigmatic persistence of dissolved organic matter in the ocean. <i>Nature Reviews Earth & Environment</i> , 2021, 2, 570-583.	12.2	84
304	Preferential alignment and heterogeneous distribution of active non-spherical swimmers near Lagrangian coherent structures. <i>Physics of Fluids</i> , 2021, 33, .	1.6	10
305	Theoretical Constraints Imposed by Gradient Detection and Dispersal on Microbial Size in Astrobiological Environments. <i>Astrobiology</i> , 2021, 21, 813-830.	1.5	4
307	Environmental vulnerability of the global ocean epipelagic plankton community interactome. <i>Science Advances</i> , 2021, 7, .	4.7	54
308	Evolution and Physiology of Amphibious Yeasts. <i>Annual Review of Microbiology</i> , 2021, 75, 337-357.	2.9	3
309	SAR11 Cells Rely on Enzyme Multifunctionality To Metabolize a Range of Polyamine Compounds. <i>MBio</i> , 2021, 12, e0109121.	1.8	10
310	Tight Adherence (Tad) Pilus Genes Indicate Putative Niche Differentiation in Phytoplankton Bloom Associated Rhodobacterales. <i>Frontiers in Microbiology</i> , 2021, 12, 718297.	1.5	16
311	Cultivation of particle-associated heterotrophic bacteria during a spring phytoplankton bloom in the North Sea. <i>Systematic and Applied Microbiology</i> , 2021, 44, 126232.	1.2	4
313	High-Throughput Analysis to Decipher Bacterial Diversity and their Functional Properties in Freshwater Bodies. , 2021, , 511-542.		0
314	Complex Interactions Between Aquatic Organisms and Their Chemical Environment Elucidated from Different Perspectives. , 2020, , 279-297.		5
315	Aging a little: On the optimality of limited senescence in <i>Escherichia coli</i> . <i>Journal of Theoretical Biology</i> , 2020, 502, 110331.	0.8	5

#	ARTICLE	IF	CITATIONS
316	Swimming in the sea: chemotaxis by marine bacteria. <i>Microbiology Australia</i> , 2018, 39, 12.	0.1	4
317	Microrheology reveals microscale viscosity gradients in planktonic systems. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2021, 118, .	3.3	24
318	Environmental fluctuations and their effects on microbial communities, populations and individuals. <i>FEMS Microbiology Reviews</i> , 2021, 45, .	3.9	87
324	Capillary filtering of particles during dip coating. <i>Physical Review Fluids</i> , 2019, 4, .	1.0	22
325	Landmarks and frontiers in biological fluid dynamics. <i>Physical Review Fluids</i> , 2019, 4, .	1.0	17
326	Flocking of active particles in a turbulent flow. <i>Physical Review Fluids</i> , 2020, 5, .	1.0	5
327	The relationship between sea ice bacterial community structure and biogeochemistry: A synthesis of current knowledge and known unknowns. <i>Elementa</i> , 2015, 3, .	1.1	26
328	Gene expression noise can promote the fixation of beneficial mutations in fluctuating environments. <i>PLoS Computational Biology</i> , 2020, 16, e1007727.	1.5	18
329	The Role of Diatom Nanostructures in Biasing Diffusion to Improve Uptake in a Patchy Nutrient Environment. <i>PLoS ONE</i> , 2013, 8, e59548.	1.1	48
330	High Metabolomic Microdiversity within Co-Occurring Isolates of the Extremely Halophilic Bacterium <i>Salinibacter ruber</i> . <i>PLoS ONE</i> , 2013, 8, e64701.	1.1	48
331	Aerobic Microbial Respiration In Oceanic Oxygen Minimum Zones. <i>PLoS ONE</i> , 2015, 10, e0133526.	1.1	99
332	Implications of Ecological Niche Differentiation in Marine Bacteria for Microbial Management in Aquaculture to Prevent Bacterial Disease. <i>PLoS Pathogens</i> , 2016, 12, e1005843.	2.1	17
333	Microbial Inhibition by Bacteria Isolated from Pallial Cavity Fluids and Associated Mucus of the Eastern Oyster <i>Crassostrea virginica</i> (Gmelin). <i>Journal of Shellfish Research</i> , 2019, 38, 565.	0.3	5
334	The 100 Åµm length scale in the microbial ocean. <i>Aquatic Microbial Ecology</i> , 2015, 76, 189-194.	0.9	19
335	Nutrient supply controls picoplankton community structure during three contrasting seasons in the northwestern Mediterranean Sea. <i>Marine Ecology - Progress Series</i> , 2016, 543, 1-19.	0.9	41
336	Mixing regime-dependent causality between phytoplankton and bacteria in the subtropical North Atlantic Ocean ecosystem. <i>Marine Ecology - Progress Series</i> , 2018, 600, 41-53.	0.9	1
337	The significance of nitrogen regeneration for new production within a filament of the Mauritanian upwelling system. <i>Biogeosciences</i> , 2016, 13, 2873-2888.	1.3	11
339	Light-dependent single-cell heterogeneity in the chloroplast redox state regulates cell fate in a marine diatom. <i>ELife</i> , 2019, 8, .	2.8	20

#	ARTICLE	IF	CITATIONS
340	Validation of picogram- and femtogram-input DNA libraries for microscale metagenomics. PeerJ, 2016, 4, e2486.	0.9	64
341	Distribution of bacterial communities along the spatial and environmental gradients from Bohai Sea to northern Yellow Sea. PeerJ, 2018, 6, e4272.	0.9	38
342	Small tropical islands with dense human population: differences in water quality of near-shore waters are associated with distinct bacterial communities. PeerJ, 2018, 6, e4555.	0.9	10
344	Microbial activity, methane production, and carbon storage in Early Holocene North Sea peats. Biogeosciences, 2021, 18, 5491-5511.	1.3	3
345	Phytoplanktonâ€Nitrifier Interactions Control the Geographic Distribution of Nitrite in the Upper Ocean. Global Biogeochemical Cycles, 2021, 35, e2021GB007072.	1.9	14
346	Fluidic bacterial diodes rectify magnetotactic cell motility in porous environments. Nature Communications, 2021, 12, 5949.	5.8	19
347	Decadal Vision in Oceanography (II). Oceanography in Japan, 2013, 22, 219-251.	0.5	7
359	Interspecific differences in the effect of fish on marine microbial plankton. Aquatic Microbial Ecology, 2019, 82, 289-298.	0.9	3
365	Using High-Sensitivity Lipidomics To Assess Microscale Heterogeneity in Oceanic Sinking Particles and Single Phytoplankton Cells. Environmental Science & Technology, 2021, 55, 15456-15465.	4.6	6
366	Deep-Sea Microbes in the Southwestern Atlantic. Brazilian Marine Biodiversity, 2020, , 133-151.	0.4	0
367	Winter river plumes shape community composition and activity of heterotrophic microorganisms on the Oregon Coast. Aquatic Microbial Ecology, 2020, 84, 15-29.	0.9	5
369	Scalar absorption by particles advected in a turbulent flow. Physical Review Fluids, 2020, 5, .	1.0	0
373	A traveling-wave solution for bacterial chemotaxis with growth. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	22
375	How Microbial Food Web Interactions Shape the Arctic Ocean Bacterial Community Revealed by Size Fractionation Experiments. Microorganisms, 2021, 9, 2378.	1.6	3
376	Variation in genomic traits of microbial communities among ecosystems. FEMS Microbes, 2022, 2, .	0.8	9
377	SensPIV: Simultaneous Visualization of Flow Fields and Oxygen Concentrations to Unravel Metabolic Exchange Fluxes. SSRN Electronic Journal, 0, , .	0.4	0
378	From genes to ecosystems: using molecular information from diatoms to understand ecological processes. , 2022, , 487-529.		1
379	Glycolysis/gluconeogenesis specialization in microbes is driven by biochemical constraints of flux sensing. Molecular Systems Biology, 2022, 18, e10704.	3.2	21

#	ARTICLE	IF	CITATIONS
380	Nutrient starvation intensifies chlorine disinfection-stressed biofilm formation. <i>Chemosphere</i> , 2022, 295, 133827.	4.2	7
381	Quorum Sensing Regulates Bacterial Processes That Play a Major Role in Marine Biogeochemical Cycles. <i>Frontiers in Marine Science</i> , 2022, 9, .	1.2	14
382	Suspended particles are hotspots for pathogen-related bacteria and ARGs in coastal beach waters of northern China. <i>Science of the Total Environment</i> , 2022, 817, 153004.	3.9	16
383	A hidden cost of mucus production by phytoplankton: Viscosity hinders nutrient uptake. <i>Limnology and Oceanography Letters</i> , 2022, 7, 261-268.	1.6	1
384	Where Do Mistakes Lead? A Survey of Games with Incompetent Players. <i>Dynamic Games and Applications</i> , 0, , 1.	1.1	1
385	Quorum Sensing Regulates the Hydrolytic Enzyme Production and Community Composition of Heterotrophic Bacteria in Coastal Waters. <i>Frontiers in Microbiology</i> , 2021, 12, 780759.	1.5	6
387	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
388	Ciliary Flows in Corals Ventilate Target Areas of High Photosynthetic Oxygen Production. <i>SSRN Electronic Journal</i> , 0, , .	0.4	1
389	Detecting food limitation of bacterial growth during dilution experiments. <i>Oceanologia</i> , 2022, , .	1.1	0
390	The ecological roles of bacterial chemotaxis. <i>Nature Reviews Microbiology</i> , 2022, 20, 491-504.	13.6	77
391	Biodiversity and Biogeography of Abundant and Rare Microbial Assemblages in the Western Subtropical Pacific Ocean. <i>Frontiers in Microbiology</i> , 2022, 13, 839562.	1.5	6
392	Impact of phosphate concentration on the metabolome of biofilms of the marine bacterium <i>Pseudoalteromonas lipolytica</i> . <i>Metabolomics</i> , 2022, 18, 18.	1.4	2
393	When are bacteria really gazelles? Comparing patchy ecologies with dimensionless numbers. <i>Ecology Letters</i> , 2022, 25, 1323-1341.	3.0	3
394	Accumulation and alignment of elongated gyrotactic swimmers in turbulence. <i>Physics of Fluids</i> , 2022, 34, 033303.	1.6	2
395	Everything in moderation or moderating everything? Nutrient balancing in the context of evolution and cancer metabolism. <i>Biology and Philosophy</i> , 2022, 37, 1.	0.7	1
396	Ecological and Evolutionary Implications of Microbial Dispersal. <i>Frontiers in Microbiology</i> , 2022, 13, 855859.	1.5	36
397	Microbial biofilms: Recent advances and progress in environmental bioremediation. <i>Science of the Total Environment</i> , 2022, 824, 153843.	3.9	39
398	Microvolume DNA extraction methods for microscale amplicon and metagenomic studies. <i>ISME Communications</i> , 2021, 1, .	1.7	10

#	ARTICLE	IF	CITATIONS
399	Chemotaxis shapes the microscale organization of the ocean's microbiome. <i>Nature</i> , 2022, 605, 132-138.	13.7	51
463	Glycine betaine uptake and metabolism in marine microbial communities. <i>Environmental Microbiology</i> , 2022, 24, 2380-2403.	1.8	20
464	An Ocean of Signals: Intracellular and Extracellular Signaling in Diatoms. , 2022, , 641-678.		3
465	The Diatom Microbiome: New Perspectives for Diatom-Bacteria Symbioses. , 2022, , 679-712.		4
466	Spatial compositional turnover varies with trophic level and body size in marine assemblages of micro- and macroorganisms. <i>Global Ecology and Biogeography</i> , 2022, 31, 1556-1570.	2.7	2
468	Simultaneous visualization of flow fields and oxygen concentrations to unravel transport and metabolic processes in biological systems. <i>Cell Reports Methods</i> , 2022, 2, 100216.	1.4	12
469	Wrapped Up: The Motility of Polarly Flagellated Bacteria. <i>Annual Review of Microbiology</i> , 2022, 76, 349-367.	2.9	17
470	Forecasting ocean microbiome shifts. <i>Nature Microbiology</i> , 2022, 7, 747-748.	5.9	1
471	Structural and Functional Characterization of Bacterial Biofilms Formed on <i>Phragmites australis</i> (Cav.) in the Rybinsk Reservoir. <i>Microbiology</i> , 2022, 91, 324-335.	0.5	0
472	Stochastic processes shape the aggregation of free-living and particle-attached bacterial communities in the Yangtze River Estuary, China. <i>Journal of Basic Microbiology</i> , 2022, 62, 1514-1525.	1.8	5
474	Historical contingencies and phage induction diversify bacterioplankton communities at the microscale. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2022, 119, .	3.3	15
475	Effect of Climate on Bacterial and Archaeal Diversity of Moroccan Marine Microbiota. <i>Microorganisms</i> , 2022, 10, 1622.	1.6	5
476	Machine learning-based inverse design for electrochemically controlled microscopic gradients of O ₂ and H ₂ O ₂ . <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2022, 119, .	3.3	2
477	Chemotaxis may assist marine heterotrophic bacterial diazotrophs to find microzones suitable for N ₂ fixation in the pelagic ocean. <i>ISME Journal</i> , 2022, 16, 2525-2534.	4.4	12
478	Motion in Stratified Fluids. <i>Annual Review of Fluid Mechanics</i> , 2023, 55, 157-192.	10.8	8
480	The use of an automated organism tracking microscope in mesocosm experiments. <i>Limnology and Oceanography: Methods</i> , 0, , .	1.0	0
481	Sharp turns and gyrotaxis modulate surface accumulation of microorganisms. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2022, 119, .	3.3	7
482	Shifts in evolutionary balance of phenotypes under environmental changes. <i>Royal Society Open Science</i> , 2022, 9, .	1.1	6

#	ARTICLE	IF	CITATIONS
483	Extant mat microbes synchronize vertical migration to a diel tempo. <i>Journal of Great Lakes Research</i> , 2022, , .	0.8	3
485	The aquatic particle number quandary. <i>Frontiers in Marine Science</i> , 0, 9, .	1.2	1
486	Particle-associated bacteria in seawater dominate the colony-forming microbiome on ZoBell marine agar. <i>FEMS Microbiology Ecology</i> , 2022, 99, .	1.3	3
487	Kinetic modulation of bacterial hydrolases by microbial community structure in coastal waters. <i>Environmental Microbiology</i> , 0, , .	1.8	0
489	Capturing marine microbiomes and environmental DNA: A field sampling guide. <i>Frontiers in Microbiology</i> , 0, 13, .	1.5	6
490	Active particles crossing sharp viscosity gradients. <i>Scientific Reports</i> , 2023, 13, .	1.6	1
491	Bacterial lifestyle switch in response to algal metabolites. <i>ELife</i> , 0, 12, .	2.8	20
492	Formation of multicellular colonies by choanoflagellates increases susceptibility to capture by amoeboid predators. <i>Journal of Eukaryotic Microbiology</i> , 0, , .	0.8	0
493	Run-and-tumble dynamics and mechanotaxis discovered in microglial migration. <i>Research</i> , 0, , .	2.8	0
494	Marine biofilms: Bacterial diversity and dynamics. , 2023, , 3-21.		1
495	Secondary metabolites from marine fungi: current status and application. , 2023, , 181-209.		2
496	Potential interactions between diatoms and bacteria are shaped by trace element gradients in the Southern Ocean. <i>Frontiers in Marine Science</i> , 0, 9, .	1.2	3
497	Active sinking particles: sessile suspension feeders significantly alter the flow and transport to sinking aggregates. <i>Journal of the Royal Society Interface</i> , 2023, 20, .	1.5	2
498	Chemotaxis increases metabolic exchanges between marine picophytoplankton and heterotrophic bacteria. <i>Nature Microbiology</i> , 2023, 8, 510-521.	5.9	13
499	Encounter rates prime interactions between microorganisms. <i>Interface Focus</i> , 2023, 13, .	1.5	1
501	Differences in the regulatory strategies of marine oligotrophs and copiotrophs reflect differences in motility. <i>Environmental Microbiology</i> , 2023, 25, 1265-1280.	1.8	4
502	Conservation of Genomic Information in Multiple Displacement Amplified Low-Quantity Metagenomic Material from Marine Invertebrates. <i>Marine Drugs</i> , 2023, 21, 165.	2.2	0
503	Microbial and Viral Genome and Proteome Nitrogen Demand Varies across Multiple Spatial Scales within a Marine Oxygen Minimum Zone. <i>MSystems</i> , 2023, 8, .	1.7	1

#	ARTICLE	IF	CITATIONS
504	A mutant fitness assay identifies bacterial interactions in a model ocean hot spot. Proceedings of the National Academy of Sciences of the United States of America, 2023, 120, .	3.3	2
505	The Landscape of Global Ocean Microbiome: From Bacterioplankton to Biofilms. International Journal of Molecular Sciences, 2023, 24, 6491.	1.8	4
506	A Reduction of Transcriptional Regulation in Aquatic Oligotrophic Microorganisms Enhances Fitness in Nutrient-Poor Environments. Microbiology and Molecular Biology Reviews, 0, , .	2.9	1
507	Thermophilic <i>Dehalococcoidia</i> with unusual traits shed light on an unexpected past. ISME Journal, 2023, 17, 952-966.	4.4	5
508	What is it like to be a choanoflagellate? Sensation, processing and behavior in the closest unicellular relatives of animals. Animal Cognition, 2023, 26, 1767-1782.	0.9	3
509	Free-Living and Particle-Associated Microbial Communities of Lake Baikal Differ by Season and Nutrient Intake. Diversity, 2023, 15, 572.	0.7	0
510	Enzymatic preparation, purification, and therapeutic applications of marine oligosaccharides. , 2023, , 231-250.		0
538	Microfluidic approaches in microbial ecology. Lab on A Chip, 2024, 24, 1394-1418.	3.1	0