David P B T B Strik

List of Publications by Year
in descending order

75 papers	6,313 citations	61857 43 h-index	85405 71 g-index
75 all docs	75 docs citations	75 times ranked	3885 citing authors

#	Article	IF	Citations
1	Concentration-dependent effects of nickel doping on activated carbon biocathodes. Catalysis Science and Technology, 2022, 12, 2500-2518.	2.1	5
2	Designing a Selective <i>n</i>-Caproate Adsorptionâ€“Recovery Process with Granular Activated Carbon and Screening of Conductive Materials in Chain Elongation. ACS ES&T Engineering, 2022, 2, 54-64.	3.7	6
3	Lactate Metabolism and Microbiome Composition Are Affected by Nitrogen Gas Supply in Continuous Lactate-Based Chain Elongation. Fermentation, 2021, 7, 41.	1.4	10
4	Catalytic Cooperation between a Copper Oxide Electrocatalyst and a Microbial Community for Microbial Electrosynthesis. ChemPlusChem, 2021, 86, 763-777.	1.3	5
5	nZVI Impacts Substrate Conversion and Microbiome Composition in Chain Elongation From D- and L-Lactate Substrates. Frontiers in Bioengineering and Biotechnology, 2021, 9, 666582.	2.0	9
6	Open Culture Ethanol-Based Chain Elongation to Form Medium Chain Branched Carboxylates and Alcohols. Frontiers in Bioengineering and Biotechnology, 2021, 9, 697439.	2.0	4
7	Cyclic Voltammetry is Invasive on Microbial Electrosynthesis. ChemElectroChem, 2021, 8, 3384-3396.	1.7	9
8	Reactor microbiome enriches vegetable oil with n-caproate and n-caprylate for potential functionalized feed additive production via extractive lactate-based chain elongation. Biotechnology for Biofuels, 2021, 14, 232.	6.2	5
9	Consecutive lactate formation and chain elongation to reduce exogenous chemicals input in repeated-batch food waste fermentation. Water Research, 2020, 169, 115215.	5.3	132
10	Concurrent use of methanol and ethanol for chain-elongating short chain fatty acids into caproate and isobutyrate. Journal of Environmental Management, 2020, 258, 110008.	3.8	9
11	Techno-economic assessment of microbial electrosynthesis from CO2 and/or organics: An interdisciplinary roadmap towards future research and application. Applied Energy, 2020, 279, 115775.	5.1	58
12	Bioelectrochemical Chain Elongation of Shortâ€Chain Fatty Acids Creates Steering Opportunities for Selective Formation of <i>nâ€</i>Butyrate, <i>nâ€</i>Valerate or <i>nâ€</i>Caproate. ChemistrySelect, 2020, 5, 9127-9133.	0.7	16
13	Methanol-Based Chain Elongation with Acetate to n-Butyrate and Isobutyrate at Varying Selectivities Dependent on pH. ACS Sustainable Chemistry and Engineering, 2020, 8, 8184-8194.	3.2	28
14	CO₂ Conversion by Combining a Copper Electrocatalyst and Wildâ€type Microorganisms. ChemCatChem, 2020, 12, 3900-3912.	1.8	8
15	A Thin Layer of Activated Carbon Deposited on Polyurethane Cube Leads to New Conductive Bioanode for (Plant) Microbial Fuel Cell. Energies, 2020, 13, 574.	1.6	9
16	Plant-Microbial Fuel Cells Serve the Environment and People. , 2020, , 315-327.		0
17	Enhanced selectivity to butyrate and caproate above acetate in continuous bioelectrochemical chain elongation from CO2: Steering with CO2 loading rate and hydraulic retention time. Bioresource Technology Reports, 2019, 7, 100284.	1.5	47
18	Activated Carbon Mixed with Marine Sediment is Suitable as Bioanode Material for Spartina anglica Sediment/Plant Microbial Fuel Cell: Plant Growth, Electricity Generation, and Spatial Microbial Community Diversity. Water (Switzerland), 2019, 11, 1810.	1.2	26

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19	Branched Medium Chain Fatty Acids: Iso-Caproate Formation from Iso-Butyrate Broadens the Product Spectrum for Microbial Chain Elongation. Environmental Science & Technology, 2019, 53, 7704-7713.	4.6	40
20	Continuous n-valerate formation from propionate and methanol in an anaerobic chain elongation open-culture bioreactor. Biotechnology for Biofuels, 2019, 12, 132.	6.2	40
21	Marine Sediment Mixed With Activated Carbon Allows Electricity Production and Storage From Internal and External Energy Sources: A New Rechargeable Bio-Battery With Bi-Directional Electron Transfer Properties. Frontiers in Microbiology, 2019, 10, 934.	1.5	7
22	Performance and Long Distance Data Acquisition via LoRa Technology of a Tubular Plant Microbial Fuel Cell Located in a Paddy Field in West Kalimantan, Indonesia. Sensors, 2019, 19, 4647.	2.1	30
23	Electricity generation from wetlands with activated carbon bioanode. IOP Conference Series: Earth and Environmental Science, 2018, 131, 012046.	0.2	6
24	Effect of n-Caproate Concentration on Chain Elongation and Competing Processes. ACS Sustainable Chemistry and Engineering, 2018, 6, 7499-7506.	3.2	42
25	Controlling Ethanol Use in Chain Elongation by CO₂ Loading Rate. Environmental Science & Technology, 2018, 52, 1496-1505.	4.6	127
26	Waterâ€Based Synthesis of Hydrophobic Ionic Liquids [N₈₈₈₈][oleate] and [P_{666,14}][oleate] and their Bioprocess Compatibility. ChemistryOpen, 2018, 7, 878-884.	0.9	4
27	Critical Biofilm Growth throughout Unmodified Carbon Felts Allows Continuous Bioelectrochemical Chain Elongation from CO2 up to Caproate at High Current Density. Frontiers in Energy Research, 2018, 6, .	1.2	146
28	Development of an Effective Chain Elongation Process From Acidified Food Waste and Ethanol Into n-Caproate. Frontiers in Bioengineering and Biotechnology, 2018, 6, 50.	2.0	79
29	Biotransformation of carbon dioxide in bioelectrochemical systems: State of the art and future prospects. Journal of Power Sources, 2017, 356, 256-273.	4.0	194
30	Production of Caproic Acid from Mixed Organic Waste: An Environmental Life Cycle Perspective. Environmental Science & Technology, 2017, 51, 7159-7168.	4.6	120
31	In situ acetate separation in microbial electrosynthesis from CO2 using ion-exchange resin. Electrochimica Acta, 2017, 237, 267-275.	2.6	52
32	Bioelectrochemical conversion of CO₂ to chemicals: CO₂ as a next generation feedstock for electricity-driven bioproduction in batch and continuous modes. Faraday Discussions, 2017, 202, 433-449.	1.6	79
33	Electricity from wetlands: Tubular plant microbial fuels with silicone gas-diffusion biocathodes. Applied Energy, 2017, 185, 642-649.	5.1	65
34	Isobutyrate biosynthesis via methanol chain elongation: converting organic wastes to platform chemicals. Journal of Chemical Technology and Biotechnology, 2017, 92, 1370-1379.	1.6	27
35	Long-term operation of microbial electrosynthesis cell reducing CO2 to multi-carbon chemicals with a mixed culture avoiding methanogenesis. Bioelectrochemistry, 2017, 113, 26-34.	2.4	154
36	Continuous Longâ€Term Bioelectrochemical Chain Elongation to Butyrate. ChemElectroChem, 2017, 4, 386-395.	1.7	95

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37	Electrodes for Cathodic Microbial Electrosynthesis Processes: Key Developments and Criteria for Effective Research and Implementation. , 2017, , 429-473.		6
38	Methanol as an alternative electron donor in chain elongation for butyrate and caproate formation. Biomass and Bioenergy, 2016, 93, 201-208.	2.9	58
39	Application of gas diffusion biocathode in microbial electrosynthesis from carbon dioxide. Environmental Science and Pollution Research, 2016, 23, 22292-22308.	2.7	170
40	Integrated Product Separation in Bioelectrochemical CO2Reduction for Improved Process Efficiency. Chemie-Ingenieur-Technik, 2016, 88, 1255-1256.	0.4	4
41	Product Specificity Influenced by Catholyte Conditions during the Microbial Electrosynthesis Process CO2to Acetate. Chemie-Ingenieur-Technik, 2016, 88, 1253-1253.	0.4	0
42	Granular sludge formation and characterization in a chain elongation process. Process Biochemistry, 2016, 51, 1594-1598.	1.8	39
43	An overview on emerging bioelectrochemical systems (BESs): Technology for sustainable electricity, waste remediation, resource recovery, chemical production and beyond. Renewable Energy, 2016, 98, 153-170.	4.3	334
44	Chain Elongation with Reactor Microbiomes: Open-Culture Biotechnology To Produce Biochemicals. Environmental Science & Technology, 2016, 50, 2796-2810.	4.6	426
45	Selective short-chain carboxylates production: A review of control mechanisms to direct mixed culture fermentations. Critical Reviews in Environmental Science and Technology, 2016, 46, 592-634.	6.6	101
46	Monophyletic group of unclassified Î³- Proteobacteria dominates in mixed culture biofilm of high-performing oxygen reducing biocathode. Bioelectrochemistry, 2015, 106, 167-176.	2.4	48
47	Carbon dioxide reduction by mixed and pure cultures in microbial electrosynthesis using an assembly of graphite felt and stainless steel as a cathode. Bioresource Technology, 2015, 195, 14-24.	4.8	276
48	Plant microbial fuel cell applied in wetlands: Spatial, temporal and potential electricity generation of Spartina anglica salt marshes and Phragmites australis peat soils. Biomass and Bioenergy, 2015, 83, 543-550.	2.9	47
49	Compost in plant microbial fuel cell for bioelectricity generation. Waste Management, 2015, 36, 63-69.	3.7	118
50	Electricity generation by a plant microbial fuel cell with an integrated oxygen reducing biocathode. Applied Energy, 2015, 137, 151-157.	5.1	136
51	Two-stage medium chain fatty acid (MCFA) production from municipal solid waste and ethanol. Applied Energy, 2014, 116, 223-229.	5.1	181
52	Electricity generation by a novel design tubular plant microbial fuel cell. Biomass and Bioenergy, 2013, 51, 60-67.	2.9	89
53	Increase of power output by change of ion transport direction in a plant microbial fuel cell. International Journal of Energy Research, 2013, 37, 1103-1111.	2.2	13
54	Electricity production with living plants on a green roof: environmental performance of the plantâ€microbial fuel cell. Biofuels, Bioproducts and Biorefining, 2013, 7, 52-64.	1.9	51

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55	Resilience of roof-top Plant-Microbial Fuel Cells during Dutch winter. Biomass and Bioenergy, 2013, 51, 1-7.	2.9	71
56	pH and Temperature Determine Performance of Oxygen Reducing Biocathodes. Electroanalysis, 2013, 25, 652-655.	1.5	20
57	The flat-plate plant-microbial fuel cell: the effect of a new design on internal resistances. Biotechnology for Biofuels, 2012, 5, 70.	6.2	74
58	Microbial community structure elucidates performance of Glyceria maxima plant microbial fuel cell. Applied Microbiology and Biotechnology, 2012, 94, 537-548.	1.7	121
59	Characterization of the internal resistance of a plant microbial fuel cell. Electrochimica Acta, 2012, 72, 165-171.	2.6	50
60	Rhizosphere anode model explains high oxygen levels during operation of a Glyceria maxima PMFC. Bioresource Technology, 2012, 108, 60-67.	4.8	48
61	New plant-growth medium for increased power output of the Plant-Microbial Fuel Cell. Bioresource Technology, 2012, 104, 417-423.	4.8	80
62	Identifying charge and mass transfer resistances of an oxygen reducing biocathode. Energy and Environmental Science, 2011, 4, 5035.	15.6	107
63	Microbial solar cells: applying photosynthetic and electrochemically active organisms. Trends in Biotechnology, 2011, 29, 41-49.	4.9	225
64	New applications and performance of bioelectrochemical systems. Applied Microbiology and Biotechnology, 2010, 85, 1673-1685.	1.7	237
65	Long-term performance of a plant microbial fuel cell with Spartina anglica. Applied Microbiology and Biotechnology, 2010, 86, 973-981.	1.7	163
66	Concurrent bio-electricity and biomass production in three Plant-Microbial Fuel Cells using Spartina anglica, Arundinella anomala and Arundo donax. Bioresource Technology, 2010, 101, 3541-3547.	4.8	202
67	Solar Energy Powered Microbial Fuel Cell with a Reversible Bioelectrode. Environmental Science & Technology, 2010, 44, 532-537.	4.6	117
68	Cathode Potential and Mass Transfer Determine Performance of Oxygen Reducing Biocathodes in Microbial Fuel Cells. Environmental Science & Technology, 2010, 44, 7151-7156.	4.6	125
69	Renewable sustainable biocatalyzed electricity production in a photosynthetic algal microbial fuel cell (PAMFC). Applied Microbiology and Biotechnology, 2008, 81, 659-668.	1.7	163
70	Green electricity production with living plants and bacteria in a fuel cell. International Journal of Energy Research, 2008, 32, 870-876.	2.2	313
71	Feasibility Study on Electrochemical Impedance Spectroscopy for Microbial Fuel Cells: Measurement Modes & Data Validation. ECS Transactions, 2008, 13, 27-41.	0.3	16
72	A pH-based control of ammonia in biogas during anaerobic digestion of artificial pig manure and maize silage. Process Biochemistry, 2006, 41, 1235-1238.	1.8	99

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73	Prediction of trace compounds in biogas from anaerobic digestion using the MATLAB Neural Network Toolbox. Environmental Modelling and Software, 2005, 20, 803-810.	1.9	117
74	Application of redox mediators to accelerate the transformation of reactive azo dyes in anaerobic bioreactors. Biotechnology and Bioengineering, 2001, 75, 691-701.	1.7	171
75	Editorial: Microbial Chain Elongation- Close the Carbon Loop by Connecting-Communities. Frontiers in Bioengineering and Biotechnology, 0, 10, .	2.0	4