Rudolf Kurt Thauer

List of Publications by Year in descending order

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283 papers

30,265 citations

4388 86 h-index 157 g-index

290 all docs

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290

14291 citing authors

#	Article	lF	CITATIONS
1	Methyl (Alkyl)-Coenzyme M Reductases: Nickel F-430-Containing Enzymes Involved in Anaerobic Methane Formation and in Anaerobic Oxidation of Methane or of Short Chain Alkanes. Biochemistry, 2019, 58, 5198-5220.	2.5	93
2	Flavin-Based Electron Bifurcation, A New Mechanism of Biological Energy Coupling. Chemical Reviews, 2018, 118, 3862-3886.	47.7	280
3	Flavin-Based Electron Bifurcation, Ferredoxin, Flavodoxin, and Anaerobic Respiration With Protons (Ech) or NAD+ (Rnf) as Electron Acceptors: A Historical Review. Frontiers in Microbiology, 2018, 9, 401.	3.5	281
4	Energy in Ancient Metabolism. Cell, 2017, 168, 953-955.	28.9	42
5	Lothar Jaenicke and C1-metabolism: his first 25 years of research. Zeitschrift Fur Naturforschung - Section C Journal of Biosciences, 2017, 72, 237-243.	1.4	1
6	Mode of action uncovered for the specific reduction of methane emissions from ruminants by the small molecule 3-nitrooxypropanol. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, 6172-6177.	7.1	190
7	Life under extreme energy limitation: a synthesis of laboratory- and field-based investigations. FEMS Microbiology Reviews, 2015, 39, 688-728.	8.6	288
8	My Lifelong Passion for Biochemistry and Anaerobic Microorganisms. Annual Review of Microbiology, 2015, 69, 1-30.	7.3	22
9	Energy Conservation Associated with Ethanol Formation from H ₂ and CO ₂ in Clostridium autoethanogenum Involving Electron Bifurcation. Journal of Bacteriology, 2015, 197, 2965-2980.	2.2	198
10	Insights into Flavin-based Electron Bifurcation via the NADH-dependent Reduced Ferredoxin:NADP Oxidoreductase Structure. Journal of Biological Chemistry, 2015, 290, 21985-21995.	3.4	102
11	Hydrogen Formation and Its Regulation in Ruminococcus albus: Involvement of an Electron-Bifurcating [FeFe]-Hydrogenase, of a Non-Electron-Bifurcating [FeFe]-Hydrogenase, and of a Putative Hydrogen-Sensing [FeFe]-Hydrogenase. Journal of Bacteriology, 2014, 196, 3840-3852.	2.2	111
12	Evidence for a Hexaheteromeric Methylenetetrahydrofolate Reductase in Moorella thermoacetica. Journal of Bacteriology, 2014, 196, 3303-3314.	2.2	115
13	Methyl-Coenzyme M Reductase from Methanogenic Archaea: Isotope Effects on the Formation and Anaerobic Oxidation of Methane. Journal of the American Chemical Society, 2013, 135, 14975-14984.	13.7	60
14	Energy conservation via electron bifurcating ferredoxin reduction and proton/Na+ translocating ferredoxin oxidation. Biochimica Et Biophysica Acta - Bioenergetics, 2013, 1827, 94-113.	1.0	663
15	Frontiers, Opportunities, and Challenges in Biochemical and Chemical Catalysis of CO ₂ Fixation. Chemical Reviews, 2013, 113, 6621-6658.	47.7	1,786
16	Methyl-Coenzyme M Reductase from Methanogenic Archaea: Isotope Effects on Label Exchange and Ethane Formation with the Homologous Substrate Ethyl-Coenzyme M. Journal of the American Chemical Society, 2013, 135, 14985-14995.	13.7	27
17	NADP-Specific Electron-Bifurcating [FeFe]-Hydrogenase in a Functional Complex with Formate Dehydrogenase in Clostridium autoethanogenum Grown on CO. Journal of Bacteriology, 2013, 195, 4373-4386.	2.2	208
18	Clostridium acidurici Electron-Bifurcating Formate Dehydrogenase. Applied and Environmental Microbiology, 2013, 79, 6176-6179.	3.1	88

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19	A Reversible Electron-Bifurcating Ferredoxin- and NAD-Dependent [FeFe]-Hydrogenase (HydABC) in Moorella thermoacetica. Journal of Bacteriology, 2013, 195, 1267-1275.	2.2	122
20	The Wolfe cycle comes full circle. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 15084-15085.	7.1	100
21	Electron Bifurcation Involved in the Energy Metabolism of the Acetogenic Bacterium Moorella thermoacetica Growing on Glucose or H ₂ plus CO ₂ . Journal of Bacteriology, 2012, 194, 3689-3699.	2.2	138
22	Structure of a methyl-coenzyme M reductase from Black Sea mats that oxidize methane anaerobically. Nature, 2012, 481, 98-101.	27.8	152
23	An Ancient Pathway Combining Carbon Dioxide Fixation with the Generation and Utilization of a Sodium Ion Gradient for ATP Synthesis. PLoS ONE, 2012, 7, e33439.	2.5	246
24	Anaerobic oxidation of methane with sulfate: on the reversibility of the reactions that are catalyzed by enzymes also involved in methanogenesis from CO2. Current Opinion in Microbiology, 2011, 14, 292-299.	5.1	150
25	More Than 200 Genes Required for Methane Formation from H ₂ and CO ₂ and Energy Conservation Are Present in <i>Methanothermobacter marburgensis</i>	2.3	107
26	Polymer/Bacteria Composite Nanofiber Nonwovens by Electrospinning of Living Bacteria Protected by Hydrogel Microparticles. Macromolecular Bioscience, 2011, 11, 333-337.	4.1	27
27	Hydrogenases and the Global H ₂ Cycle. European Journal of Inorganic Chemistry, 2011, 2011, 919-921.	2.0	40
28	Dual Role of <i>S</i> â€Adenosylmethionine (SAM ⁺) in the Methylation of sp ² â€Hybridized Electrophilic Carbons. Angewandte Chemie - International Edition, 2011, 50, 10492-10494.	13.8	17
29	Coupling of ferredoxin and heterodisulfide reduction via electron bifurcation in hydrogenotrophic methanogenic archaea. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 2981-2986.	7.1	356
30	Functionalization of Methane in Anaerobic Microorganisms. Angewandte Chemie - International Edition, 2010, 49, 6712-6713.	13.8	51
31	Intermediates in the Catalytic Cycle of Methyl Coenzymeâ€M Reductase: Isotope Exchange is Consistent with Formation of a Ïfâ€Alkane–Nickel Complex. Angewandte Chemie - International Edition, 2010, 49, 8112-8115.	13.8	46
32	The key nickel enzyme of methanogenesis catalyses the anaerobic oxidation of methane. Nature, 2010, 465, 606-608.	27.8	326
33	NADP ⁺ Reduction with Reduced Ferredoxin and NADP ⁺ Reduction with NADH Are Coupled via an Electron-Bifurcating Enzyme Complex in <i>Clostridium kluyveri</i> Bacteriology, 2010, 192, 5115-5123.	2.2	212
34	Complete Genome Sequence of <i>Methanothermobacter marburgensis</i> , a Methanoarchaeon Model Organism. Journal of Bacteriology, 2010, 192, 5850-5851.	2.2	32
35	Binding of Coenzyme B Induces a Major Conformational Change in the Active Site of Methyl-Coenzyme M Reductase. Journal of the American Chemical Society, 2010, 132, 567-575.	13.7	48
36	Hydrogenases from Methanogenic Archaea, Nickel, a Novel Cofactor, and H ₂ Storage. Annual Review of Biochemistry, 2010, 79, 507-536.	11.1	374

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37	The crystal structure of C176A mutated [Fe]â€hydrogenase suggests an acylâ€iron ligation in the active site iron complex. FEBS Letters, 2009, 583, 585-590.	2.8	223
38	Celebrating Achim Trebst's 80th birthday. Photosynthesis Research, 2009, 100, 117-119.	2.9	2
39	Crystal structures and enzymatic properties of three formyltransferases from archaea: Environmental adaptation and evolutionary relationship. Protein Science, 2009, 11, 2168-2178.	7.6	25
40	Structural and functional analysis of the gpsA gene product of Archaeoglobus fulgidus: A glycerol-3-phosphate dehydrogenase with an unusual NADP+ preference. Protein Science, 2009, 13, 3161-3171.	7.6	9
41	Carbon monoxide as intrinsic ligand to iron in the active site of [fe]-hydrogenase. Metal lons in Life Sciences, 2009, 6, 219-40.	2.8	0
42	The exchange activities of [Fe]Âhydrogenase (iron–sulfur-cluster-free hydrogenase) from methanogenic archaea in comparison with the exchange activities of [FeFe] and [NiFe]Âhydrogenases. Journal of Biological Inorganic Chemistry, 2008, 13, 97-106.	2.6	84
43	Coordination and binding geometry of methyl-coenzyme M in the red1m state of methyl-coenzyme M reductase. Journal of Biological Inorganic Chemistry, 2008, 13, 1275-1289.	2.6	11
44	<i>Methane as Fuel for Anaerobic Microorganisms</i> . Annals of the New York Academy of Sciences, 2008, 1125, 158-170.	3.8	174
45	Methanogenic archaea: ecologically relevant differences in energy conservation. Nature Reviews Microbiology, 2008, 6, 579-591.	28.6	1,674
46	Structure of an F430 Variant from Archaea Associated with Anaerobic Oxidation of Methane. Journal of the American Chemical Society, 2008, 130, 10758-10767.	13.7	74
47	The Crystal Structure of [Fe]-Hydrogenase Reveals the Geometry of the Active Site. Science, 2008, 321, 572-575.	12.6	565
48	Characterization of the Fe Site in Ironâ [^] Sulfur Cluster-Free Hydrogenase (Hmd) and of a Model Compound via Nuclear Resonance Vibrational Spectroscopy (NRVS). Inorganic Chemistry, 2008, 47, 3969-3977.	4.0	97
49	A Nickel Hydride Complex in the Active Site of Methyl-Coenzyme M Reductase: Implications for the Catalytic Cycle. Journal of the American Chemical Society, 2008, 130, 10907-10920.	13.7	68
50	The genome of <i>Clostridium kluyveri < /i>, a strict anaerobe with unique metabolic features. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 2128-2133.</i>	7.1	409
51	Coupled Ferredoxin and Crotonyl Coenzyme A (CoA) Reduction with NADH Catalyzed by the Butyryl-CoA Dehydrogenase/Etf Complex from <i>Clostridium kluyveri</i> . Journal of Bacteriology, 2008, 190, 843-850.	2.2	379
52	Re -Citrate Synthase from Clostridium kluyveri Is Phylogenetically Related to Homocitrate Synthase and Isopropylmalate Synthase Rather Than to Si -Citrate Synthase. Journal of Bacteriology, 2007, 189, 4299-4304.	2.2	63
53	The CO and CNâʾʾligands to the active site Fe in [NiFe]-hydrogenase ofEscherichia colihave different metabolic origins. FEBS Letters, 2007, 581, 3317-3321.	2.8	48
54	A Fifth Pathway of Carbon Fixation. Science, 2007, 318, 1732-1733.	12.6	121

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55	Methyl-Coenzyme M Reductase and its Nickel Corphin Coenzyme F430 in Methanogenic Archaea. , 2007, , 323-356.		20
56	A third type of hydrogenase catalyzing H2 activation. Chemical Record, 2007, 7, 37-46.	5.8	258
57	Structure of coenzyme F420H2 oxidase (FprA), a di-iron flavoprotein from methanogenic Archaea catalyzing the reduction of O2 to H2O. FEBS Journal, 2007, 274, 1588-1599.	4.7	65
58	Postâ€translational modifications in the active site region of methylâ€coenzymeâ€∫M reductase from methanogenic and methanotrophic archaea. FEBS Journal, 2007, 274, 4913-4921.	4.7	63
59	Two sub-states of the red2 state of methyl-coenzyme M reductase revealed by high-field EPR spectroscopy. Journal of Biological Inorganic Chemistry, 2007, 12, 1097-1105.	2.6	15
60	The Physiological Role of the Ribulose Monophosphate Pathway in Bacteria and Archaea. Bioscience, Biotechnology and Biochemistry, 2006, 70, 10-21.	1.3	121
61	Insight into the mechanism of biological methanol activation based on the crystal structure of the methanol-cobalamin methyltransferase complex. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 18917-18922.	7.1	81
62	The Structure of Formylmethanofuran: Tetrahydromethanopterin Formyltransferase in Complex with its Coenzymes. Journal of Molecular Biology, 2006, 357, 870-879.	4.2	17
63	The Crystal Structure of the Apoenzyme of the Iron–Sulphur Cluster-free Hydrogenase. Journal of Molecular Biology, 2006, 358, 798-809.	4.2	108
64	Methane and microbes. Nature, 2006, 440, 878-879.	27.8	68
65	A Nickel–Alkyl Bond in an Inactivated State of the Enzyme Catalyzing Methane Formation. Angewandte Chemie - International Edition, 2006, 45, 3602-3607.	13.8	49
66	The Genome Sequence of Methanosphaera stadtmanae Reveals Why This Human Intestinal Archaeon Is Restricted to Methanol and H 2 for Methane Formation and ATP Synthesis. Journal of Bacteriology, 2006, 188, 642-658.	2.2	245
67	The Iron-Sulfur Cluster-free Hydrogenase (Hmd) Is a Metalloenzyme with a Novel Iron Binding Motif. Journal of Biological Chemistry, 2006, 281, 30804-30813.	3.4	134
68	Heme Biosynthesis in Methanosarcina barkeri via a Pathway Involving Two Methylation Reactions. Journal of Bacteriology, 2006, 188, 8666-8668.	2.2	42
69	Si-face stereospecificity at C5 of coenzyme F420 for F420H2 oxidase from methanogenic Archaea as determined by mass spectrometry. FEBS Journal, 2005, 272, 5337-5342.	4.7	6
70	Formaldehyde activating enzyme (Fae) and hexulose-6-phosphate synthase (Hps) in Methanosarcina barkeri: a possible function in ribose-5-phosphate biosynthesis. Archives of Microbiology, 2005, 184, 41-48.	2.2	33
71	Temperature dependence of methyl-coenzyme M reductase activity and of the formation of the methyl-coenzyme M reductase red2 state induced by coenzyme B. Journal of Biological Inorganic Chemistry, 2005, 10, 333-342.	2.6	53
72	The structure of F420-dependent methylenetetrahydromethanopterin dehydrogenase: a crystallographic `superstructure' of the selenomethionine-labelled protein crystal structure. Acta Crystallographica Section D: Biological Crystallography, 2005, 61, 198-202.	2.5	4

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73	How an Enzyme Binds the C1 Carrier Tetrahydromethanopterin. Journal of Biological Chemistry, 2005, 280, 13712-13719.	3.4	18
74	Mössbauer Studies of the Ironâ [^] Sulfur Cluster-Free Hydrogenase: The Electronic State of the Mononuclear Fe Active Site. Journal of the American Chemical Society, 2005, 127, 10430-10435.	13.7	155
75	Methyl-coenzyme M reductase and the anaerobic oxidation of methane in methanotrophic Archaea. Current Opinion in Microbiology, 2005, 8, 643-648.	5.1	166
76	Crystal structure of methylenetetrahydromethanopterin reductase (Mer) in complex with coenzyme F420: Architecture of the F420/FMN binding site of enzymes within the nonprolylcis-peptide containing bacterial luciferase family. Protein Science, 2005, 14, 1840-1849.	7.6	59
77	Spin Density and Coenzyme M Coordination Geometry of the ox1 Form of Methyl-Coenzyme M Reductase:  A Pulse EPR Study. Journal of the American Chemical Society, 2005, 127, 17744-17755.	13.7	54
78	Coenzyme Binding in F420-Dependent Secondary Alcohol Dehydrogenase, a Member of the Bacterial Luciferase Family. Structure, 2004, 12, 361-370.	3.3	62
79	Spectroscopic investigation of the nickel-containing porphinoid cofactor F430. Comparison of the free cofactor in the ± 1 , ± 2 and ± 3 oxidation states with the cofactor bound to methyl-coenzyme M reductase in the silent, red and ox forms. Journal of Biological Inorganic Chemistry, 2004, 9, 563-576.	2.6	37
80	Probing the reactivity of Ni in the active site of methyl-coenzyme M reductase with substrate analogues. Journal of Biological Inorganic Chemistry, 2004, 9, 691-705.	2.6	60
81	F420H2 oxidase (FprA) from Methanobrevibacter arboriphilus, a coenzyme F420-dependent enzyme involved in O2 detoxification. Archives of Microbiology, 2004, 182, 126-37.	2.2	100
82	Tetrahydrofolate-specific enzymes in Methanosarcina barkeri and growth dependence of this methanogenic archaeon on folic acid or p-aminobenzoic acid. Archives of Microbiology, 2004, 182, 313-325.	2.2	35
83	UVâ€A/blueâ€light inactivation of the â€~metalâ€free' hydrogenase (Hmd) from methanogenic archaea. FEBS Journal, 2004, 271, 195-204.	0.2	192
84	The Cofactor of the Iron–Sulfur Cluster Free Hydrogenase Hmd: Structure of the Lightâ€Inactivation Product. Angewandte Chemie - International Edition, 2004, 43, 2547-2551.	13.8	145
85	Carbon Monoxide as an Intrinsic Ligand to Iron in the Active Site of the Ironâ^'Sulfur-Cluster-Free Hydrogenase H ₂ -Forming Methylenetetrahydromethanopterin Dehydrogenase As Revealed by Infrared Spectroscopy. Journal of the American Chemical Society, 2004, 126, 14239-14248.	13.7	203
86	Coordination and geometry of the nickel atom in active methyl-coenzyme M reductase from Methanothermobacter marburgensis as detected by X-ray absorption spectroscopy. Journal of Biological Inorganic Chemistry, 2003, 8, 141-148.	2.6	36
87	Coenzyme F420-dependent methylenetetrahydromethanopterin dehydrogenase fromMethanopyrus kandleri: the selenomethionine-labelled and non-labelled enzyme crystallized in two different forms. Acta Crystallographica Section D: Biological Crystallography, 2003, 59, 1653-1655.	2.5	6
88	A conspicuous nickel protein in microbial mats that oxidize methane anaerobically. Nature, 2003, 426, 878-881.	27.8	344
89	Characterization of the MCRred2 form of methyl-coenzyme M reductase: a pulse EPR and ENDOR study. Journal of Biological Inorganic Chemistry, 2003, 8, 586-593.	2.6	33
90	Coenzyme B Induced Coordination of Coenzyme M via Its Thiol Group to Ni(I) of F430in Active Methyl-Coenzyme M Reductase. Journal of the American Chemical Society, 2003, 125, 4988-4989.	13.7	59

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91	Coenzyme F420-dependent Methylenetetrahydromethanopterin Dehydrogenase (Mtd) from Methanopyrus kandleri: A Methanogenic Enzyme with an Unusual Quarternary Structure. Journal of Molecular Biology, 2003, 332, 1047-1057.	4.2	39
92	Structure and function of the nickel tetrapyrrole F430 in methanogenic archaea. Biochemical Society Transactions, 2002, 30, A51-A51.	3.4	0
93	The nickel enzyme methyl-coenzymeÂM reductase from methanogenic archaea: In vitro induction of the nickel-based MCR-ox EPR signals from MCR-red2. Journal of Biological Inorganic Chemistry, 2002, 7, 500-513.	2.6	45
94	The nickel enzyme methyl-coenzyme M reductase from methanogenic archaea: in vitro interconversions among the EPR detectable MCR-red1 and MCR-red2 states. Journal of Biological Inorganic Chemistry, 2002, 7, 101-112.	2.6	46
95	The role of zinc in the methylation of the coenzymeâ€∫M thiol group in methanol:coenzymeâ€∫M methyltransferase fromMethanosarcina barkeri. FEBS Journal, 2002, 269, 2117-2123.	0.2	27
96	Molybdenum and tungsten enzymes in C1 metabolism. Metal lons in Biological Systems, 2002, 39, 571-619.	0.4	16
97	On the mechanism of biological methane formation: structural evidence for conformational changes in methyl-coenzyme M reductase upon substrate binding. Journal of Molecular Biology, 2001, 309, 315-330.	4.2	183
98	Re-face stereospecificity of NADP dependent methylenetetrahydromethanopterin dehydrogenase fromMethylobacterium extorquensAM1 as determined by NMR spectroscopy. FEBS Letters, 2001, 494, 95-98.	2.8	8
99	The Na+-translocating methyltransferase complex from methanogenic archaea. Biochimica Et Biophysica Acta - Bioenergetics, 2001, 1505, 28-36.	1.0	157
100	[28] Tetrahydromethanopterin-specific enzymes from Methanopyrus kandleri. Methods in Enzymology, 2001, 331, 317-353.	1.0	34
101	Re-Face Stereospecificity of Methylenetetrahydromethanopterin and Methylenetetrahydrofolate Dehydrogenases is Predetermined by Intrinsic Properties of the Substrate. ChemBioChem, 2001, 2, 530-541.	2.6	25
102	Characterization of a Heme-Dependent Catalase from Methanobrevibacter arboriphilus. Applied and Environmental Microbiology, 2001, 67, 3041-3045.	3.1	42
103	Methyl-coenzyme M formation in methanogenic archaea. FEBS Journal, 2000, 267, 2498-2504.	0.2	49
104	N-Carboxymethanofuran (carbamate) formation from methanofuran and CO2 in methanogenic archaea. FEBS Journal, 2000, 267, 3130-3138.	0.2	24
105	Characterization of a second methylene tetrahydromethanopterin dehydrogenase from Methylobacterium extorquens AM1. FEBS Journal, 2000, 267, 3762-3769.	0.2	68
106	A mutation affecting the association equilibrium of formyltransferase from the hyperthermophilic Methanopyrus kandleri and its influence on the enzyme's activity and thermostability. FEBS Journal, 2000, 267, 6619-6623.	0.2	18
107	Protection of Methanosarcina barkeri against oxidative stress: identification and characterization of an iron superoxide dismutase. Archives of Microbiology, 2000, 174, 213-216.	2.2	49
108	Regulation of the synthesis of H 2 -forming methylenetetrahydromethanopterin dehydrogenase (Hmd) and of HmdII and HmdIII in Methanothermobacter marburgensis. Archives of Microbiology, 2000, 174, 225-232.	2.2	65

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109	Novel Formaldehyde-Activating Enzyme inMethylobacterium extorquens AM1 Required for Growth on Methanol. Journal of Bacteriology, 2000, 182, 6645-6650.	2.2	173
110	The Biosynthesis of Methylated Amino Acids in the Active Site Region of Methyl-coenzyme M Reductase. Journal of Biological Chemistry, 2000, 275, 3755-3760.	3.4	77
111	Comparison of three methyl-coenzyme M reductases from phylogenetically distant organisms: unusual amino acid modification, conservation and adaptation. Journal of Molecular Biology, 2000, 303, 329-344.	4.2	156
112	The metal-free hydrogenase from methanogenic archaea: evidence for a bound cofactor. FEBS Letters, 2000, 485, 200-204.	2.8	89
113	The DNA binding protein Tfx from Methanobacterium thermoautotrophicum: structure, DNA binding properties and transcriptional regulation. Molecular Microbiology, 1999, 31, 641-650.	2.5	39
114	Purification, characterization, and primary structure of a monofunctional catalase from Methanosarcina barkeri. Archives of Microbiology, 1999, 171, 317-323.	2.2	46
115	The crystal structure of methenyltetrahydromethanopterin cyclohydrolase from the hyperthermophilic archaeon Methanopyrus kandleri. Structure, 1999, 7, 1257-1268.	3.3	43
116	A methenyl tetrahydromethanopterin cyclohydrolase and a methenyl tetrahydrofolate cyclohydrolase in Methylobacterium extorquens AM1. FEBS Journal, 1999, 261, 475-480.	0.2	80
117	Methanol:coenzyme M methyltransferase fromMethanosarcina barkeri - substitution of the corrinoid harbouring subunit MtaC by free cob(l)alamin. FEBS Journal, 1999, 261, 674-681.	0.2	43
118	Cytochrome c-dependent methacrylate reductase from Geobacter sulfurreducens AM-1. FEBS Journal, 1999, 263, 346-352.	0.2	35
119	Methylcobalamin:homocysteine methyltransferase from Methanobacterium thermoautotrophicum . Identification as the metE gene product. FEBS Journal, 1999, 263, 789-796.	0.2	22
120	The energy conserving methyltetrahydromethanopterin:coenzyme M methyltransferase complex from methanogenic archaea: function of the subunit MtrH. FEBS Letters, 1999, 449, 165-168.	2.8	36
121	Distribution of Tetrahydromethanopterin-Dependent Enzymes in Methylotrophic Bacteria and Phylogeny of Methenyl Tetrahydromethanopterin Cyclohydrolases. Journal of Bacteriology, 1999, 181, 5750-5757.	2.2	124
122	An <i>Escherichia coli</i> hydrogenaseâ€3â€ŧype hydrogenase in methanogenic archaea. FEBS Journal, 1998, 252, 467-476.	0.2	98
123	Thiol: fumarate reductase (Tfr) from Methanobacterium thermoautotrophicum. Identification of the catalytic sites for fumarate reduction and thiol oxidation. FEBS Journal, 1998, 253, 292-299.	0.2	45
124	Methanol: coenzyme M methyltransferase from Methanosarcina barkeri. Identification of the active-site histidine in the corrinoid-harboring subunit MtaC by site-directed mutagenesis. FEBS Journal, 1998, 253, 698-705.	0.2	36
125	Lyotropic-salt-induced changes in monomer/dimer/tetramer association equilibrium of formyltransferase from the hyperthermophilic Methanopyrus kandleri in relation to the activity and thermostability of the enzyme. FEBS Journal, 1998, 258, 85-92.	0.2	44
126	Two malate dehydrogenases in Methanobacterium thermoautotrophicum. Archives of Microbiology, 1998, 170, 38-42.	2,2	37

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127	His84rather than His35is the active site histidine in the corrinoid protein MtrA of the energy conserving methyltransferase complex fromMethanobacterium thermoautotrophicum. FEBS Letters, 1998, 436, 401-402.	2.8	14
128	F420H2:NADP oxidoreductase fromMethanobacterium thermoautotrophicum: identification of the encoding gene via functional overexpression inEscherichia coli. FEBS Letters, 1998, 438, 124-126.	2.8	13
129	Biochemistry of methanogenesis: a tribute to Marjory Stephenson:1998 Marjory Stephenson Prize Lecture. Microbiology (United Kingdom), 1998, 144, 2377-2406.	1.8	987
130	C1 Transfer Enzymes and Coenzymes Linking Methylotrophic Bacteria and Methanogenic Archaea. , 1998, 281, 99-102.		295
131	The NADP-Dependent Methylene Tetrahydromethanopterin Dehydrogenase in <i>Methylobacterium extorquens</i>	2.2	90
132	Crystal Structure of Methyl-Coenzyme M Reductase: The Key Enzyme of Biological Methane Formation. Science, 1997, 278, 1457-1462.	12.6	547
133	Purified Methyl-Coenzyme-M Reductase is Activated when the Enzyme-Bound Coenzyme F430 is Reduced to the Nickel(I) Oxidation State by Titanium(III) Citrate. FEBS Journal, 1997, 243, 110-114.	0.2	130
134	Heterodisulfide Reductase from Methanol-Grown Cells of Methanosarcina Barkeri is not a Flavoenzyme. FEBS Journal, 1997, 244, 226-234.	0.2	76
135	Identification of the Active Site Histidine in the Corrinoid Protein MtrA of the Energy-Conserving Methyltransferase Complex From Methanobacterium Thermoautotrophicum. FEBS Journal, 1997, 250, 783-788.	0.2	24
136	Structures and Functions of Four Anabolic 2-Oxoacid Oxidoreductases in Methanobacterium Thermoautotrophicum. FEBS Journal, 1997, 244, 862-868.	0.2	67
137	The Active Species of 'CO2' Utilized by Formylmethanofuran Dehydrogenase from Methanogenic Archaea. FEBS Journal, 1997, 248, 919-924.	0.2	54
138	Methanol: Coenzyme M Methyltransferase from Methanosarcina Barkeri. Zinc Dependence and Thermodynamics of the Methanol:Cob(I)alamin Methyltransferase Reaction. FEBS Journal, 1997, 249, 280-285.	0.2	79
139	Overexpression of the Coenzyme-F420-Dependent N5,N10-Methylenetetrahydromethanopterin Dehydrogenase Gene from the Hyperthermophilic Methanopyrus Kandleri. FEBS Journal, 1997, 245, 386-391.	0.2	18
140	Methanol: Coenzyme M Methyltransferase from Methanosarcina Barkeri. Purification, Properties and Encoding Genes of the Corrinoid Protein MT1. FEBS Journal, 1997, 243, 670-677.	0.2	102
141	Pathways of autotrophic CO 2 fixation and of dissimilatory nitrate reduction to N 2 O in Ferroglobus placidus. Archives of Microbiology, 1997, 167, 19-23.	2.2	7 3
142	Crystal structure of Methyl-CoM reductase containing a Ni-porphinoid. Journal of Inorganic Biochemistry, 1997, 67, 180.	3.5	1
143	A seleniumâ€dependent and a seleniumâ€independent formylmethanofuran dehydrogenase and their transcriptional regulation in the hyperthermophilic Methanopyrus kandleri. Molecular Microbiology, 1997, 23, 1033-1042.	2.5	68
144	Reactions with Molecular Hydrogen in Microorganisms:  Evidence for a Purely Organic Hydrogenation Catalyst. Chemical Reviews, 1996, 96, 3031-3042.	47.7	257

#	Article	IF	CITATIONS
145	Re-face stereospecificity at C4 of NAD(P) for alcohol dehydrogenase fromMethanogenium organophilumand for (R)-2-hydroxyglutarate dehydrogenase fromAcidaminococcus fermentansas determined by1H-NMR spectroscopy. FEBS Letters, 1996, 399, 92-94.	2.8	7
146	Primary structure and properties of the formyltransferase from the mesophilic Methanosarcina barkeri: comparison with the enzymes from thermophilic and hyperthermophilic methanogens. Archives of Microbiology, 1996, 165, 97-105.	2.2	21
147	Primary Structure of Cyclohydrolase (Mch) from Methanobacterium thermoautotrophicum (Strain) Tj ETQq1 1 C 294-300.	0.784314 0.2	rgBT /Overloc 24
148	Methylcobalamin:Coenzyme M Methyltransferase Isoenzymes MtaA and MtbA from Methanosarcina barkeri. Cloning, Sequencing and Differential Transcription of the Encoding Genes, and Functional Overexpression of the mtaA Gene in Escherichia coli. FEBS Journal, 1996, 235, 653-659.	0.2	72
149	Si-Face Stereospecificity at C5 of Coenzyme F420 for F420-Dependent Glucose-6-Phosphate Dehydrogenase from Mycobacterium smegmatis and F420-Dependent Alcohol Dehydrogenase from Methanoculleus thermophilicus. FEBS Journal, 1996, 239, 93-97.	0.2	18
150	The Corrinoid-Containing 23-kDa Subunit MtrA of the Energy-Conserving N5-Methyltetrahydromethanopterin:coenzyme M Methyltransferase Complex from Methanobacterium Thermoautotrophicum. EPR Spectroscopic evidence for a Histidine Residue as a Cobalt Ligand of the Cobamide. FEBS Journal, 1996, 241, 149-154.	0.2	40
151	The Molybdenum Formylmethanofuran Dehydrogenase Operon and the Tungsten Formylmethanofuran Dehydrogenase Operon from Methanobacterium Thermoautotrophicum. Structures and Transcriptional Regulation. FEBS Journal, 1996, 242, 156-162.	0.2	52
152	A Polyferredoxin with Eight [4Fe-4S] Clusters as a Subunit of Molybdenum Formylmethanofuran Dehydrogenase from Methanosarcina barkeri. FEBS Journal, 1996, 236, 309-317.	0.2	56
153	Crystallization and preliminary X-ray diffraction studies of formylmethanofuran: Tetrahydromethanopterin formyltransferase fromMethanopyrus kandleri. , 1996, 26, 118-120.		13
154	The hemA gene encoding glutamyl-tRNA reductase from the archaeon Methanobacterium thermoautotrophicum strain Marburg. Bioorganic and Medicinal Chemistry, 1996, 4, 1089-1095.	3.0	12
155	Characterization of a 45-kDa Flavoprotein and Evidence for a Rubredoxin, two Proteins that could Participate in Electron Transport from H2 to CO2 in Methanogenesis in Methanobacterium Thermoautotrophicum. FEBS Journal, 1995, 231, 628-638.	0.2	32
156	The Energy Conserving N5-Methyltetrahydromethanopterin:Coenzyme M Methyltransferase Complex from Methanobacterium thermoautotrophicum is Composed of Eight Different Subunits. FEBS Journal, 1995, 228, 640-648.	0.2	66
157	Hydrogen Isotope Effects in the Reactions Catalyzed by H2-forming N5,N10-Methylenetetrahydromethanopterin Dehydrogenase from Methanogenic Archaea. FEBS Journal, 1995, 233, 372-376.	0.2	31
158	The Tungsten Formylmethanofuran Dehydrogenase from Methanobacterium Thermoautotrophicum Contains Sequence Motifs Characteristic for Enzymes Containing Molybdopterin Dinucleotide. FEBS Journal, 1995, 234, 910-920.	0.2	76
159	On the Mechanism of Catalysis by a Metal-Free Hydrogenase from Methanogenic Archaea: Enzymatic Transformation of H2 without a Metal and Its Analogy to the Chemistry of Alkanes in Superacidic Solution. Angewandte Chemie International Edition in English, 1995, 34, 2247-2250.	4.4	78
160	Elucidation of the Stereochemical Course of Chemical Reactions by Magnetic Labeling. Journal of the American Chemical Society, 1995, 117, 2941-2942.	13.7	49
161	H2-formingN5,N10-methylenetetrahydromethanopterin dehydrogenase: mechanism of H2formation analyzed using hydrogen isotopes. FEBS Letters, 1995, 368, 203-206.	2.8	29
162	Enzymes and coenzymes of the carbon monoxide dehydrogenase pathway for autotrophic CO2 fixation in Archaeoglobus lithotrophicus and the lack of carbon monoxide dehydrogenase in the heterotrophic A. profundus. Archives of Microbiology, 1995, 163, 112-118.	2.2	83

#	Article	IF	CITATIONS
163	Formylmethanofuran: Tetrahydromethanopterin Formyltransferase (Ftr) from the Hyperthermophilic Methanopyrus kandleri. Cloning, Sequencing and Functional Expression of the ftr Gene and One-Step Purification of the Enzyme Overproduced in Escherichia coli. FEBS Journal, 1995, 230, 906-913.	0.2	25
164	Coenzyme F420-Dependent N 5,N 10-Methylenetetrahydromethanopterin Reductase (Mer) from Methanobacterium Thermoautotrophicum Strain Marburg. Cloning, Sequencing, Transcriptional Analysis, and Functional Expression in Escherichia Coli of the mer Gene. FEBS Journal, 1995, 231, 773-778.	0.2	3
165	The Heterodisulfide Reductase from Methanobacterium Thermoautotrophicum Contains Sequence Motifs Characteristic of pyridine-Nucleotide-Dependent Thioredoxin Reductases. FEBS Journal, 1994, 225, 253-261.	0.2	85
166	The Energetics and Sodium-Ion Dependence of N5-Methyltetrahydromethanopterin:Coenzyme M Methyltransferase Studied with Cob(I)Alamin as Methyl Acceptor and Methylcob(III)Alamin as Methyl Donor. FEBS Journal, 1994, 226, 799-809.	0.2	56
167	Thermodynamics of the Formylmethanofuran Dehydrogenase Reaction in Methanobacterium Thermoautotrophicum. FEBS Journal, 1994, 226, 811-818.	0.2	62
168	H2: heterodisulfide oxidoreductase complex from Methanobacterium thermoautotrophicum. Composition and properties. FEBS Journal, 1994, 220, 139-148.	0.2	99
169	Formylmethanofuran dehydrogenases from methanogenic Archaea Substrate specificity, EPR properties and reversible inactivation by cyanide of the molybdenum or tungsten iron-sulfur proteins. FEBS Journal, 1994, 220, 477-484.	0.2	57
170	Purification of a two-subunit cytochrome-b-containing heterodisulfide reductase from methanol-grown Methanosarcina barkeri. FEBS Journal, 1994, 221, 855-861.	0.2	65
171	F420H2: quinone oxidoreductase from Archaeoglobus fulgidus. Characterization of a membrane-bound multisubunit complex containing FAD and iron-sulfur clusters. FEBS Journal, 1994, 223, 503-511.	0.2	64
172	N5-Methyltetrahydromethanopterin:Coenzyme M Methyltransferase from Methanobacterium thermoautotrophicum. Catalytic Mechanism and Sodium Ion Dependence. FEBS Journal, 1994, 226, 465-472.	0.2	48
173	Tungstate does not support synthesis of active formylmethanofuran dehydrogenase in Methanosarcina barkeri. Archives of Microbiology, 1994, 161, 528-530.	2.2	21
174	Tungstate can substitute for molybdate in sustaining growth of Methanobacterium thermoautotrophicum. Archives of Microbiology, 1994, 161, 220-228.	2.2	76
175	H2-Forming N5,N10-Methylenetetrahydromethanopterin Dehydrogenase from Methanobacterium thermoautotrophicum Catalyzes a Stereoselective Hydride Transfer As Determined by Two-Dimensional NMR Spectroscopy. Biochemistry, 1994, 33, 3986-3993.	2.5	71
176	Function of methylcobalamin: coenzyme M methyltransferase isoenzyme II in Methanosarcina barkeri. Archives of Microbiology, 1993, 159, 530-536.	2.2	34
177	H2-forming N5,N10-methylenetetrahydromethanopterin dehydrogenase from Methanobacterium thermoautotrophicum. Studies of the catalytic mechanism of H2 formation using hydrogen isotopes. FEBS Journal, 1993, 212, 255-261.	0.2	54
178	Purification of a cytochrome b containing H2:heterodisulfide oxidoreductase complex from membranes of Methanosarcina barkeri. FEBS Journal, 1993, 213, 529-535.	0.2	62
179	Purification and properties of N5-methyltetrahydromethanopterin: coenzyme M methyltransferase from Methanobacterium thermoautotrophicum. FEBS Journal, 1993, 213, 537-545.	0.2	79
180	Si-face stereospecificity at C5 of coenzyme F420 for F420-dependent N5,N10-methylenetetrahydromethanopterin dehydrogenase, F420-dependent N5,N10-methylenetetrahydromethanopterin reductase and F420H2:dimethylnaphthoquinone oxidoreductase. FEBS Journal, 1993, 214, 641-646.	0.2	23

#	Article	IF	CITATIONS
181	Properties of the two isoenzymes of methyl-coenzyme M reductase in Methanobacterium thermoautotrophicum. FEBS Journal, 1993, 217, 587-595.	0.2	76
182	Two N 5, N 10-methylenetetrahydromethanopterin dehydrogenases in the extreme thermophile Methanopyrus kandleri: characterization of the coenzyme F420-dependent enzyme. Archives of Microbiology, 1993, 160, 186-192.	2.2	18
183	Dehalogenation of trichlorofluoromethane (CFC-11) byMethanosarcina barkeri. FEMS Microbiology Letters, 1992, 90, 201-204.	1.8	41
184	Differential expression of the two methyl-coenzyme M reductases in Methanobacterium thermoautotrophicum as determined immunochemically via isoenzyme-specific antisera. FEBS Journal, 1992, 206, 87-92.	0.2	73
185	A tungsten-containing active formylmethanofuran dehydrogenase in the thermophilic archaeon Methanobacterium wolfei. FEBS Journal, 1992, 207, 559-565.	0.2	69
186	H2-forming methylenetetrahydromethanopterin dehydrogenase, a novel type of hydrogenase without iron-sulfur clusters in methanogenic archaea. FEBS Journal, 1992, 208, 511-520.	0.2	181
187	A molybdenum and a tungsten isoenzyme of formylmethanofuran dehydrogenase in the thermophilic archaeon Methanobacterium wolfei. FEBS Journal, 1992, 209, 1013-1018.	0.2	75
188	Substrate-analogue-induced changes in the nickel-EPR spectrum of active methyl-coenzyme-M reductase from Methanobacterium thermoautotrophicum. FEBS Journal, 1992, 210, 101-107.	0.2	47
189	Salt dependence, kinetic properties and catalytic mechanism of N-formylmethanofuran:tetrahydromethanopterin formyltransferase from the extreme thermophile Methanopyrus kandleri. FEBS Journal, 1992, 210, 971-981.	0.2	80
190	Hydrogen-forming and coenzyme-F420-reducing methylene tetrahydromethanopterin dehydrogenase are genetically distinct enzymes in Methanobacterium thermoautotrophicum (Marburg). FEBS Journal, 1991, 202, 1205-1208.	0.2	42
191	Activities of formylmethanofuran dehydrogenase, methylenetetrahydromethanopterin dehydrogenase, methylenetetrahydromethanopterin reductase, and heterodisulfide reductase in methanogenic bacteria. Archives of Microbiology, 1991, 155, 459-465.	2.2	104
192	The molybdoenzyme formylmethanofuran dehydrogenase from Methanosarcina barkeri contains a pterin cofactor. FEBS Journal, 1990, 194, 367-372.	0.2	48
193	Purification and properties of N5, N10-methylenetetrahydromethanopterin reductase from Methanobacterium thermoautotrophicum (strain Marburg). FEBS Journal, 1990, 191, 187-193.	0.2	62
194	Purification and properties of heterodisulfide reductase from Methanobacterium thermoautotrophicum (strain Marburg). FEBS Journal, 1990, 193, 255-261.	0.2	103
195	Two genetically distinct methyl-coenzyme M reductases in Methanobacterium thermoautotrophicum strain Marburg and DeltaH. FEBS Journal, 1990, 194, 871-877.	0.2	105
196	Methanogenesis from acetate in cell extracts of Methanosarcina barkeri: Isotope exchange between CO2 and the carbonyl group of acetyl-CoA, and the role of H2. Archives of Microbiology, 1990, 153, 156-162.	2,2	40
197	Anaerobic lactate oxidation to 3 CO2 by Archaeoglobus fulgidus via the carbon monoxide dehydrogenase pathway: demonstration of the acetyl-CoA carbon-carbon cleavage reaction in cell extracts. Archives of Microbiology, 1990, 153, 215-218.	2.2	67
198	The Active Species of "CO ₂ " Formed by Carbon Monoxide Dehydrogenase from Peptostreptococcus productus. Zeitschrift Fur Naturforschung - Section C Journal of Biosciences, 1989, 44, 392-396.	1.4	20

#	Article	IF	Citations
199	Proton translocation coupled to the oxidation of carbon monoxide to CO ₂ and H ₂ in <i>Methanosarcina barkeri</i> i>. FEBS Journal, 1989, 179, 469-472.	0.2	68
200	Methyl-coenzyme-M reductase from Methanobacterium thermoautotrophicum (strain Marburg). Purity, activity and novel inhibitors. FEBS Journal, 1989, 184, 63-68.	0.2	74
201	Carbonic anhydrase activity in acetate grown Methanosarcina barkeri. Archives of Microbiology, 1989, 151, 137-142.	2.2	93
202	Methyltetrahydromethanopterin as an intermediate in methanogenesis from acetate in Methanosarcina barkeri. Archives of Microbiology, 1989, 151, 459-465.	2.2	64
203	Anaerobic acetate oxidation to CO2 by Desulfotomaculum acetoxidans. Archives of Microbiology, 1989, 152, 189-195.	2.2	22
204	Coenzyme F430 as a possible catalyst for the reductive dehalogenation of chlorinated C1 hydrocarbons in methanogenic bacteria. Biochemistry, 1989, 28, 10061-10065.	2.5	179
205	Reductive dehalogenation of chlorinated C1-hydrocarbons mediated by corrinoids. Biochemistry, 1989, 28, 4908-4914.	2.5	182
206	The final step in methane formation. Investigations with highly purified methyl-CoM reductase (component C) from Methanobacterium thermoautotrophicum (strain Marburg). FEBS Journal, 1988, 172, 669-677.	0.2	230
207	Citric-acid cycle, 50 years on. Modifications and an alternative pathway in anaerobic bacteria. FEBS Journal, 1988, 176, 497-508.	0.2	143
208	Anaerobic acetate oxidation to CO2 by Desulfotomaculum acetoxidans. Archives of Microbiology, 1988, 150, 374-380.	2.2	85
209	Lactate conversion to acetate, CO2 and H2 in cell suspensions of Desulfovibrio vulgaris (Marburg): indications for the involvement of an energy driven reaction. Archives of Microbiology, 1988, 150, 26-31.	2.2	7 5
210	Membrane-bound NADPH dehydrogenase- and ferredoxin: NADP oxidoreductase activity involved in electron transport during acetate oxidation to CO2 in Desulfobacter postgatei. Archives of Microbiology, 1988, 150, 145-154.	2.2	23
211	Different effects of 5-fluorouracil onMethanosarcina barkeriand onMethanobacterium thermoautotrophicum. FEMS Microbiology Letters, 1988, 49, 43-47.	1.8	1
212	Carbonylierung in anaeroben Bakterien. Nachrichten Aus Der Chemie, 1988, 36, 993-997.	0.0	5
213	Methanogenesis from Acetate by Methanosarcina barkeri: Catalysis of Acetate Formation from Methyl lodide, CO2, and H2 by the Enzyme System Involved. Zeitschrift Fur Naturforschung - Section C Journal of Biosciences, 1987, 42, 360-372.	1.4	38
214	î"-aminolevulinic acid formation in the archaebacterium Methanobacterium thermoautotrophicum requires tRNAGlu. Carlsberg Research Communications, 1987, 52, 363-371.	1.8	42
215	Non-enzymatic ammonia formation from glutamine under growth conditions forMethanobacterium thermoautotrophicum. FEMS Microbiology Letters, 1987, 40, 179-181.	1.8	8
216	The corrinoid from Methanobacterium thermoautotrophicum (Marburg strain). Spectroscopic structure analysis and identification as Cobeta-cyano-5'-hydroxybenzimidazolyl-cobamide (factor III). FEBS Journal, 1987, 162, 275-278.	0.2	48

#	Article	IF	Citations
217	Proton-motive-force-driven formation of CO from CO2 and H2 in methanogenic bacteria. FEBS Journal, 1987, 168, 407-412.	0.2	52
218	Acetate oxidation to CO2 in anaerobic bacteria via a novel pathway not involving reactions of the citric acid cycle. Archives of Microbiology, 1986, 145, 162-172.	2.2	217
219	ATP-driven succinate oxidation in the catabolism of Desulfuromonas acetoxidans. Archives of Microbiology, 1986, 144, 78-83.	2.2	59
220	Growth the Wolinella succinogenes on H2S plus fumarate and on formate plus sulfur as energy sources. Archives of Microbiology, 1986, 144, 147-150.	2.2	95
221	Methane formation from methyl-coenzyme M in a system containing methyl-coenzyme M reductase, component B and reduced cobalamin. FEBS Journal, 1986, 156, 171-177.	0.2	74
222	Coupling of carbon monoxide oxidation to CO2 and H2 with the phosphorylation of ADP in acetate-grown Methanosarcina barkeri. FEBS Journal, 1986, 159, 393-398.	0.2	85
223	Evidence for the involvement and role of a corrinoid enzyme in methane formation from acetate in Methanosarcina barkeri. Archives of Microbiology, 1985, 142, 175-179.	2.2	45
224	Defective formation and/or utilization of carbon monoxide in H2/CO2 fermenting methanogens dependent on acetate as carbon source. Archives of Microbiology, 1985, 143, 266-269.	2.2	41
225	Mechanism of acetate oxidation to CO2 with elemental sulfur in Desulfuromonas acetoxidans. Archives of Microbiology, 1985, 141, 392-398.	2.2	74
226	Formation of carbon monoxide from CO2 and H2 by Methanobacterium thermoautotrophicum. FEBS Journal, 1985, 146, 149-154.	0.2	45
227	Is coenzyme M bound to factor F430 in methanogenic bacteria?. Experiments with Methanobrevibacter ruminantium. FEBS Journal, 1985, 148, 107-111.	0.2	21
228	Zur Kenntnis des Faktors F430 aus methanogenen Bakterien: Über die Natur der Isolierungsartefakte von F430, ein Beitrag zur Chemie von F430 und zur konformationellen Stereochemie der Ligandperipherie von hydroporphinoiden Nickel(II)-Komplexen. Helvetica Chimica Acta, 1985, 68, 1338-1358.	1.6	83
229	Zur Kenntnis des Faktors F430 aus methanogenen Bakterien: Struktur des proteinfreien Faktors. Helvetica Chimica Acta, 1984, 67, 334-351.	1.6	100
230	Carbon assimilation pathways in sulfate reducing bacteria. Formate, carbon dioxide, carbon monoxide, and acetate assimilation by Desulfovibrio baarsii. Archives of Microbiology, 1984, 138, 257-262.	2.2	94
231	Functional relationship between protein-bound and free factor F430 in Methanobacterium. Archives of Microbiology, 1984, 139, 332-337.	2.2	39
232	Studies on the biosynthesis of coenzyme F420 in methanogenic bacteria. Archives of Microbiology, 1984, 137, 362-365.	2.2	43
233	Catalysis of an isotopic exchange between CO2 and the carboxyl group of acetate by Methanosarcina barkeri grown on acetate. Archives of Microbiology, 1984, 138, 365-370.	2.2	86
234	Growth yields and saturation constant of Desulfovibrio vulgaris in chemostat culture. Archives of Microbiology, 1984, 137, 236-240.	2.2	65

#	Article	IF	CITATIONS
235	Carbon monoxide production by Methanobacterium thermoautotrophicum. FEMS Microbiology Letters, 1983, 20, 229-232.	1.8	59
236	Uroporphyrinogen III, an intermediate in the biosynthesis of the nickel-containing factor F430 in Methanobacterium thermoautotrophicum. FEBS Journal, 1983, 135, 109-112.	0.2	38
237	Propionate assimilation by methanogenic bacteria. Archives of Microbiology, 1983, 136, 106-110.	2.2	34
238	Unusual pathway of isoleucine biosynthesis in Methanobacterium thermoautotrophicum. Archives of Microbiology, 1983, 136, 111-113.	2.2	38
239	Anaerobic acetate oxidation to CO2 by Desulfobacter postgatei. Archives of Microbiology, 1983, 136, 222-229.	2.2	107
240	Anaerobic acetate oxidation to CO2 by Desulfobacter postgatei. Archives of Microbiology, 1983, 136, 230-233.	2.2	48
241	Biosynthesis of 5-aminolevulinic acid in Methanobacterium thermoautotrophicum. Archives of Microbiology, 1983, 135, 237-240.	2.2	36
242	Electrogenic sodium ion/proton antiport in Desulfovibrio vulgaris. Archives of Microbiology, 1983, 136, 69-73.	2.2	18
243	Drei neue Nickelenzyme aus anaeroben Bakterien. Die Naturwissenschaften, 1983, 70, 60-64.	1.6	23
244	Sodium dependence of methane formation in methanogenic bacteria. FEBS Letters, 1982, 143, 323-326.	2.8	123
245	Different Ks values for hydrogen of methanogenic bacteria and sulfate reducing bacteria: An explanation for the apparent inhibition of methanogenesis by sulfate. Archives of Microbiology, 1982, 131, 278-282.	2.2	371
246	Kinetic mechanism for the ability of sulfate reducers to out-compete methanogens for acetate. Archives of Microbiology, 1982, 132, 285-288.	2.2	318
247	Incorporation of methionine-derived methyl groups into factor F430byMethanobacterium thermoautotrophicum. FEBS Letters, 1981, 130, 133-136.	2.8	42
248	Hydrogenase frommethanobacterium thermoautotrophicum, a nickel-containing enzyme. FEBS Letters, 1981, 136, 165-169.	2.8	181
249	Sodium dependence of growth and methane formation in Methanobacterium thermoautotrophicum. Archives of Microbiology, 1981, 130, 319-321.	2.2	77
250	Inhibition of factor F430synthesis by levulinic acid inMethanobacterium thermoautotrophicum. FEMS Microbiology Letters, 1981, 12, 167-170.	1.8	30
251	Factor F420degradation inMethanobacterium thermoautotrophicumduring exposure to oxygen. FEMS Microbiology Letters, 1981, 12, 347-349.	1.8	76
252	Vectorial electron transport in Degulfovibrio vulgaris (Marburg) growing on hydrogen plus sulfate as sole energy source. Archives of Microbiology, 1980, 125, 167-174.	2.2	127

#	Article	IF	CITATIONS
253	Acetate thiokinase and the assimilation of acetate in Methanobacterium thermoautotrophicum. Archives of Microbiology, 1980, 128, 248-252.	2.2	85
254	Incorporation of 8 succinate per mol nickel into factors F430 by Methanobacterium thermoautotrophicum. Archives of Microbiology, 1980, 128, 256-262.	2.2	58
255	Nickel, a component of factor F 430 from Methanobacterium thermoautotrophicum. Archives of Microbiology, 1980, 124, 103-106.	2.2	163
256	Growth parameters (K s, ?max, Y s) of Methanobacterium thermoautotrophicum. Archives of Microbiology, 1980, 127, 59-65.	2.2	371
257	Nickel dependence of factor F430 content in Methanobacterium thermoautotrophicum. Archives of Microbiology, 1980, 127, 273-277.	2.2	76
258	Biological role of nickel. Trends in Biochemical Sciences, 1980, 5, 304-306.	7. 5	88
259	Biosynthetic evidence for a nickel tetrapyrrole structure of factor F430 from Methanobacterium thermoautotrophicum. FEBS Letters, 1980, 119, 118-120.	2.8	110
260	Methanogene Bakterien. Die Naturwissenschaften, 1979, 66, 89-94.	1.6	35
261	Nickel, cobalt, and molybdenum requirement for growth of Methanobacterium thermoautotrophicum. Archives of Microbiology, 1979, 123, 105-107.	2.2	343
262	Acetate and carbon dioxide assimilation by Desulfovibrio vulgaris (Marburg), growing on hydrogen and sulfate as sole energy source. Archives of Microbiology, 1979, 123, 301-305.	2.2	67
263	Nickel requirement for carbon monoxide dehydrogenase formation in Clostridium pasteurianum. Archives of Microbiology, 1979, 122, 117-120.	2.2	102
264	Ferredoxin degradation in growing Clostridium pasteurianum during periods of iron deprivation. Archives of Microbiology, 1979, 120, 73-76.	2.2	46
265	Acetate assimilation and the synthesis of alanine, aspartate and glutamate inMethanobacterium thermoautotrophicum. Archives of Microbiology, 1978, 117, 61-66.	2.2	164
266	Function of fumarate reductase in methanogenic bacteria (Methanobacterium). Archives of Microbiology, 1978, 119, 215-218.	2.2	21
267	Growth yields and growth rates of Desulfovibrio vulgaris (Marburg) growing on hydrogen plus sulfate and hydrogen plus thiosulfate as the sole energy sources. Archives of Microbiology, 1978, 117, 209-214.	2.2	173
268	Isolation and characterization of Desulfovibrio growing on hydrogen plus sulfate as the sole energy source. Archives of Microbiology, 1978, 116, 41-49.	2.2	185
269	Purification and Properties of Reduced Ferredoxin: CO2 Oxidoreductase from Clostridium pasteurianum, a Molybdenum Iron-Sulfur-Protein. FEBS Journal, 1978, 85, 125-135.	0.2	89
270	A rapid procedure for the purification of ferredoxin from clostridia using polyethyleneimine. FEBS Letters, 1978, 89, 219-222.	2.8	87

#	Article	IF	CITATIONS
271	Carbon Monoxide Oxidation by <i>Clostridium thermoaceticum</i> and <i>Clostridium formicoaceticum</i> Journal of Bacteriology, 1978, 136, 597-606.	2.2	286
272	The Active Species of 'CO2' Utilized by Reduced Ferredoxin: CO2 Oxidoreductase from Clostridium pasteurianum. FEBS Journal, 1975, 55, 111-117.	0.2	51
273	The Internal-Alkaline pH Gradient, Sensitive to Uncoupler and ATPase Inhibitor, in Growing Clostridium pasteurianum. FEBS Journal, 1975, 55, 445-453.	0.2	149
274	The active species of ?CO2? utilized in ferredoxin-linked carboxylation reactions. Archives of Microbiology, 1975, 104, 237-240.	2.2	18
275	The Reaction of the Iron-Sulfur Protein Hydrogenase with Carbon Monoxide. FEBS Journal, 1974, 42, 447-452.	0.2	85
276	Carbon-Monoxide Oxidation in Cell-Free Extracts of Clostridium pasteurianum. FEBS Journal, 1974, 45, 343-349.	0.2	67
277	Carbon Monoxide Oxidation by Growing Cultures of Clostridium pasteurianum. FEBS Journal, 1974, 49, 111-115.	0.2	68
278	Properties and Function of the Pyruvate-Formate-Lyase Reaction in Clostridiae. FEBS Journal, 1972, 27, 282-290.	0.2	116
279	Regulation of the Reduced Nicotinamide Adenine Dinucleotide Phosphate-Ferredoxin Reductase System in Clostridium kluyveri. Journal of Biological Chemistry, 1971, 246, 954-959.	3.4	36
280	Glycine Formation via Threonine and Serine Aldolase. Its Interrelation with the Pyruvate Formate Lyase Pathway of One-carbon Unit Synthesis in Clostridium kluyveri. FEBS Journal, 1970, 16, 424-429.	0.2	25
281	Glyoxylate inhibition of clostridial pyruvate synthase. FEBS Letters, 1970, 9, 271-273.	2.8	36
282	Ferredoxin mediated hydrogen formation from NADPH in a cell-free system of Clostridium kluyveri. FEBS Letters, 1969, 3, 144-146.	2.8	38
283	Confirmation of unusual stereochemistry of glutamate biosynthesis in clostridium kluyveri. FEBS Letters, 1968, 1, 74-76.	2.8	4