

Angelika Brckner

List of Publications by Year in Descending Order

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

245
papers

11,061
citations

54
h-index

97
g-index

259
ext. papers

12,334
ext. citations

7.8
avg, IF

6.29
L-index

#	Paper	IF	Citations
245	Scalable and selective deuteration of (hetero)arenes.. <i>Nature Chemistry</i> , 2022 ,	17.6	5
244	Dihydroxyacetone valorization with high atom efficiency via controlling radical oxidation pathways over natural mineral-inspired catalyst. <i>Nature Communications</i> , 2021 , 12, 6840	17.4	0
243	In situ electron paramagnetic resonance spectroscopy for catalysis. <i>Nature Reviews Methods Primers</i> , 2021 , 1,		13
242	Impact of dopants on catalysts containing Ce _{1-x} M _x O ₂ -[(M = Fe, Sb or Bi) in NH ₃ -SCR of NO _x [A multiple spectroscopic approach. <i>Journal of Catalysis</i> , 2021 ,	7.3	2
241	Avoiding Pitfalls in Comparison of Activity and Selectivity of Solid Catalysts for Electrochemical HMF Oxidation. <i>ChemistryOpen</i> , 2021 , 10, 600-606	2.3	0
240	Simultaneously Tuning the Defects and Surface Properties of TaN Nanoparticles by Mg-Zr Codoping for Significantly Accelerated Photocatalytic H Evolution. <i>Journal of the American Chemical Society</i> , 2021 , 143, 10059-10064	16.4	17
239	Controlling the O-Vacancy Formation and Performance of Au/ZnO Catalysts in CO ₂ Reduction to Methanol by the ZnO Particle Size. <i>ACS Catalysis</i> , 2021 , 11, 9022-9033	13.1	10
238	Promoting Photocatalytic Hydrogen Evolution Activity of Graphitic Carbon Nitride with Hole-Transfer Agents. <i>ChemSusChem</i> , 2021 , 14, 306-312	8.3	9
237	Rhodium-catalyzed carbonylative coupling of alkyl halides with thiols: a radical process faster than easier nucleophilic substitution. <i>Chemical Communications</i> , 2021 , 57, 1466-1469	5.8	5
236	Oligomerization of n-butenes over Ni/SiO ₂ /Al ₂ O ₃ : influence of support modification by steam-treating. <i>Catalysis Science and Technology</i> , 2021 , 11, 4732-4740	5.5	0
235	Synergistic Nanostructured MnO _x /TiO ₂ Catalyst for Highly Selective Synthesis of Aromatic Imines. <i>ChemCatChem</i> , 2021 , 13, 1990-1997	5.2	2
234	Role of Surface Acidity in Formation and Performance of Active Ni Single Sites in Supported Catalysts for Butene Dimerization: A View inside by Operando EPR and In Situ FTIR Spectroscopy. <i>ACS Catalysis</i> , 2021 , 11, 3541-3552	13.1	5
233	A Versatile Ambient-to-High-Pressure Reaction Transmission Cell for in situ/operando Infrared Spectroscopic Investigations. <i>Chemistry Methods</i> , 2021 , 1, 308-314		0
232	A Versatile Ambient-to-High-Pressure Reaction Transmission Cell for in situ/operando Infrared Spectroscopic Investigations. <i>Chemistry Methods</i> , 2021 , 1, 307-307		
231	Ni-In Synergy in CO Hydrogenation to Methanol. <i>ACS Catalysis</i> , 2021 , 11, 11371-11384	13.1	17
230	Tiny Species with Big Impact: High Activity of Cu Single Atoms on CeO ₂ /TiO ₂ Deciphered by Operando Spectroscopy. <i>ACS Catalysis</i> , 2021 , 11, 10933-10949	13.1	5
229	In-situ experimental and computational approach to investigate the nature of active site in low-temperature CO-PROX over CuO _x -CeO ₂ catalyst. <i>Applied Catalysis A: General</i> , 2021 , 624, 118305	5.1	3

228	Electronic metal-support interactions and their promotional effect on CO ₂ methanation on Ru/ZrO ₂ catalysts. <i>Journal of Catalysis</i> , 2021 , 400, 407-420	7.3	6
227	Insight into the properties of MnO-CoO-CeO catalyst series for the selective catalytic reduction of NO by CH ₄ and NH ₃ . <i>Science of the Total Environment</i> , 2021 , 784, 147394	10.2	4
226	Supported Cu Single-Ion Catalyst for Total Carbon Utilization of C ₁ and C ₂ Biomass-Based Platform Molecules in the N-Formylation of Amines. <i>Chemistry - A European Journal</i> , 2021 , 27, 16889-16895	4.8	1
225	Steering the selectivity in CO ₂ reduction on highly active Ru/TiO ₂ catalysts: Support particle size effects. <i>Journal of Catalysis</i> , 2021 , 401, 160-173	7.3	3
224	Cobalt Single-Atom Catalysts with High Stability for Selective Dehydrogenation of Formic Acid. <i>Angewandte Chemie - International Edition</i> , 2020 , 59, 15849-15854	16.4	65
223	Cobalt Single-Atom Catalysts with High Stability for Selective Dehydrogenation of Formic Acid. <i>Angewandte Chemie</i> , 2020 , 132, 15983-15988	3.6	6
222	Visible-Light Photocatalytic Ozonation Using Graphitic CN Catalysts: A Hydroxyl Radical Manufacturer for Wastewater Treatment. <i>Accounts of Chemical Research</i> , 2020 , 53, 1024-1033	24.3	36
221	Active Sites of the Selective Catalytic Reduction of NO by NH ₃ over Fe-ZSM-5: Combining Reaction Kinetics with Postcatalytic Mössbauer Spectroscopy at Cryogenic Temperatures. <i>ACS Catalysis</i> , 2020 , 10, 3119-3130	13.1	7
220	Multivariate Analysis of Coupled Operando EPR/XANES/EXAFS/UV-Vis/ATR-IR Spectroscopy: A New Dimension for Mechanistic Studies of Catalytic Gas-Liquid Phase Reactions. <i>Chemistry - A European Journal</i> , 2020 , 26, 7395-7404	4.8	9
219	Impact of Al Activators on Structure and Catalytic Performance of Cr Catalysts in Homogeneous Ethylene Oligomerization [A Multitechnique in situ/operando Study]. <i>ChemCatChem</i> , 2020 , 12, 964-964	5.2	
218	Determining the Location of Co ²⁺ in Zeolites by UV-Vis Diffuse Reflection Spectroscopy: A Critical View. <i>Catalysts</i> , 2020 , 10, 123	4	7
217	Impact of Al Activators on Structure and Catalytic Performance of Cr Catalysts in Homogeneous Ethylene Oligomerization [A Multitechnique in situ/operando Study]. <i>ChemCatChem</i> , 2020 , 12, 1025-1035	5.2	8
216	The Effect of Iron and Vanadium in VO _x /Ce _{1-x} Fe _x O ₂ -[Catalysts in Low-Temperature Selective Catalytic Reduction of NO _x by Ammonia. <i>ChemCatChem</i> , 2020 , 12, 2440-2451	5.2	4
215	Conversion of γ -Valerolactone to Ethyl Valerate over Metal Promoted Ni/ZSM-5 Catalysts: Influence of Ni ⁰ /Ni ²⁺ Heterojunctions on Activity and Product Selectivity. <i>ChemCatChem</i> , 2020 , 12, 1341-1349	5.2	7
214	Selective nickel-catalyzed fluoroalkylations of olefins. <i>Chemical Communications</i> , 2020 , 56, 15157-15160	5.8	6
213	Effect of Formaldehyde in Selective Catalytic Reduction of NO by Ammonia (NH-SCR) on a Commercial VO-WO/TiO Catalyst under Model Conditions. <i>Environmental Science & Technology</i> , 2020 , 54, 11753-11761	10.3	11
212	Influence of MoS ₂ on Activity and Stability of Carbon Nitride in Photocatalytic Hydrogen Production. <i>Catalysts</i> , 2019 , 9, 695	4	10
211	The dynamic nature of Cu sites in Cu-SSZ-13 and the origin of the seagull NO _x conversion profile during NH ₃ -SCR. <i>Reaction Chemistry and Engineering</i> , 2019 , 4, 1000-1018	4.9	54

210	Sustainable Co-Synthesis of Glycolic Acid, Formamides and Formates from 1,3-Dihydroxyacetone by a Cu/Al ₂ O ₃ Catalyst with a Single Active Sites. <i>Angewandte Chemie - International Edition</i> , 2019 , 58, 5251-5255	16.4	18
209	Practical Catalytic Cleavage of C(sp ³)-C(sp ²) Bonds in Amines. <i>Angewandte Chemie - International Edition</i> , 2019 , 58, 10693-10697	16.4	18
208	Innenrücktitelbild: Sustainable Co-Synthesis of Glycolic Acid, Formamides and Formates from 1,3-Dihydroxyacetone by a Cu/Al ₂ O ₃ Catalyst with a Single Active Sites (Angew. Chem. 16/2019). <i>Angewandte Chemie</i> , 2019 , 131, 5517-5517	3.6	1
207	Vinylboron Self-Promoted Carbonylative Coupling with Cyclobutanone Oxime Esters. <i>Organic Letters</i> , 2019 , 21, 1766-1769	6.2	27
206	Sustainable Co-Synthesis of Glycolic Acid, Formamides and Formates from 1,3-Dihydroxyacetone by a Cu/Al ₂ O ₃ Catalyst with a Single Active Sites. <i>Angewandte Chemie</i> , 2019 , 131, 5305-5309	3.6	2
205	Number of Reactive Charge Carriers: A Hidden Linker between Band Structure and Catalytic Performance in Photocatalysts. <i>ACS Catalysis</i> , 2019 , 9, 8852-8861	13.1	14
204	Donor-acceptor covalent organic frameworks for visible light induced free radical polymerization. <i>Chemical Science</i> , 2019 , 10, 8316-8322	9.4	72
203	Alcohol Synthesis from CO, H ₂ , and Olefins over Alkali-Promoted Au Catalysts-A Catalytic and In situ FTIR Spectroscopic Study. <i>ChemSusChem</i> , 2019 , 12, 651-660	8.3	8
202	Mechanism of the selective reduction of NO _x by methane over Co-ZSM-5. <i>Applied Catalysis B: Environmental</i> , 2018 , 230, 184-193	21.8	34
201	Heterostructured Copper-Ceria and Iron-Ceria Nanorods: Role of Morphology, Redox, and Acid Properties in Catalytic Diesel Soot Combustion. <i>Langmuir</i> , 2018 , 34, 2663-2673	4	46
200	The role of ozone and influence of band structure in WO ₃ photocatalysis and ozone integrated process for pharmaceutical wastewater treatment. <i>Journal of Hazardous Materials</i> , 2018 , 360, 481-489	12.8	48
199	Synergistic effect of VO _x and MnO _x surface species for improved performance of V ₂ O ₅ /Ce _{0.5} Ti _{0.5} Mn _x O ₂ catalysts in low-temperature NH ₃ -SCR of NO. <i>Catalysis Science and Technology</i> , 2018 , 8, 6360-6374	5.5	15
198	Gallic Acid-Promoted SET Process for Cyclobutanone Oximes Activation and (Carbonylative-)Alkylation of Olefins. <i>ACS Catalysis</i> , 2018 , 8, 10926-10930	13.1	44
197	Relations between Structure, Activity and Stability in C ₃ N ₄ Based Photocatalysts Used for Solar Hydrogen Production. <i>Catalysts</i> , 2018 , 8, 52	4	8
196	Efficient VO _x /Ce _{1-x} Ti _x O ₂ Catalysts for Low-Temperature NH ₃ -SCR: Reaction Mechanism and Active Sites Assessed by in Situ/Operando Spectroscopy. <i>ACS Catalysis</i> , 2017 , 7, 1693-1705	13.1	118
195	Practical and General Manganese-Catalyzed Carbonylative Coupling of Alkyl Iodides with Amides. <i>ChemCatChem</i> , 2017 , 9, 915-919	5.2	20
194	Influence of Sb on the Structure and Performance of Pd-Based Catalysts: An X-ray Spectroscopic Study. <i>Journal of Physical Chemistry C</i> , 2017 , 121, 3854-3861	3.8	6
193	H ₂ Generation with (Mixed) Plasmonic Cu/Au-TiO ₂ Photocatalysts: Structure-Reactivity Relationships Assessed by in situ Spectroscopy. <i>ChemCatChem</i> , 2017 , 9, 1025-1031	5.2	23

192	Synthesis of Single Atom Based Heterogeneous Platinum Catalysts: High Selectivity and Activity for Hydrosilylation Reactions. <i>ACS Central Science</i> , 2017 , 3, 580-585	16.8	90
191	From the Precursor to the Active State: Monitoring Metamorphosis of Electrocatalysts During Water Oxidation by In Situ Spectroscopy. <i>ChemElectroChem</i> , 2017 , 4, 2117-2122	4.3	7
190	V2O5-WO3/TiO2 catalysts under thermal stress: Responses of structure and catalytic behavior in the selective catalytic reduction of NO by NH3. <i>Applied Catalysis B: Environmental</i> , 2017 , 217, 365-377	21.8	48
189	Effects of Imidazole-Type Ligands in Cu/TEMPO-Mediated Aerobic Alcohol Oxidation. <i>Inorganic Chemistry</i> , 2017 , 56, 684-691	5.1	15
188	Light to Hydrogen: Photocatalytic Hydrogen Generation from Water with Molecularly-Defined Iron Complexes. <i>Inorganics</i> , 2017 , 5, 14	2.9	30
187	Origins of high catalyst loading in copper(i)-catalysed Ullmann-Goldberg C-N coupling reactions. <i>Chemical Science</i> , 2017 , 8, 7203-7210	9.4	32
186	The Role of NO2 in the Fast NH3-SCR of NOx: A Combined In Situ FTIR and EPR Spectroscopic Study. <i>Topics in Catalysis</i> , 2017 , 60, 1641-1652	2.3	20
185	Fast Electron Transfer and OH Formation: Key Features for High Activity in Visible-Light-Driven Ozonation with C3N4 Catalysts. <i>ACS Catalysis</i> , 2017 , 7, 6198-6206	13.1	101
184	DeNOx active iron sites in iron loaded ZSM-5 by multitechnique analysis of a complex heterogeneous catalyst based on Mössbauer spectroscopy. <i>Hyperfine Interactions</i> , 2017 , 238, 1	0.8	3
183	Nickel as a co-catalyst for photocatalytic hydrogen evolution on graphitic-carbon nitride (g-C3N4): what is the nature of the active species?. <i>Chemical Communications</i> , 2016 , 52, 104-7	5.8	118
182	Effect of support synthesis methods on structure and performance of VOx/CeO2 catalysts in low-temperature NH3-SCR of NO. <i>Catalysis Communications</i> , 2016 , 84, 171-174	3.2	17
181	Glycerol as a Building Block for Prochiral Aminoketone, N-Formamide, and N-Methyl Amine Synthesis. <i>ChemSusChem</i> , 2016 , 9, 3133-3138	8.3	11
180	Tracing Active Sites in Supported Ni Catalysts during Butene Oligomerization by Operando Spectroscopy under Pressure. <i>ACS Catalysis</i> , 2016 , 6, 8224-8228	13.1	30
179	Palladium-Catalyzed Trifluoromethylation of (Hetero)Arenes with CF3 Br. <i>Angewandte Chemie - International Edition</i> , 2016 , 55, 2782-6	16.4	95
178	Ruthenium(III)/phosphine/pyridine complexes applied in the hydrogenation reactions of polar and apolar double bonds. <i>Journal of Molecular Structure</i> , 2016 , 1111, 84-89	3.4	9
177	The nature of strong Brønsted acidity of Ni-SMM clay. <i>Applied Catalysis B: Environmental</i> , 2016 , 191, 62-75	21.8	11
176	Palladium-Catalyzed Trifluoromethylation of (Hetero)Arenes with CF3Br. <i>Angewandte Chemie</i> , 2016 , 128, 2832-2836	3.6	31
175	How Temperature Affects the Mechanism of CO Oxidation on Au/TiO2: A Combined EPR and TAP Reactor Study of the Reactive Removal of TiO2 Surface Lattice Oxygen in Au/TiO2 by CO. <i>ACS Catalysis</i> , 2016 , 6, 5005-5011	13.1	53

174	Engineering titania nanostructure to tune and improve its photocatalytic activity. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016 , 113, 3966-71	11.5	86
173	Structure-reactivity relationships in VO _x /Ce _x Zr _{1-x} O ₂ catalysts used for low-temperature NH ₃ -SCR of NO. <i>Applied Catalysis B: Environmental</i> , 2016 , 197, 159-167	21.8	38
172	Heterogeneous Platinum-Catalyzed C-H Perfluoroalkylation of Arenes and Heteroarenes. <i>Angewandte Chemie</i> , 2015 , 127, 4394-4398	3.6	16
171	Titanocene(III) complexes with 2-phosphinoaryloxy ligands for the catalytic dehydrogenation of dimethylamine borane. <i>Dalton Transactions</i> , 2015 , 44, 12103-11	4.3	21
170	Solar Hydrogen Production by Plasmonic Au/TiO ₂ Catalysts: Impact of Synthesis Protocol and TiO ₂ Phase on Charge Transfer Efficiency and H ₂ Evolution Rates. <i>ACS Catalysis</i> , 2015 , 5, 2137-2148	13.1	166
169	Active Sites for Light Driven Proton Reduction in Y ₂ Ti ₂ O ₇ and CsTaWO ₆ Pyrochlore Catalysts Detected by In Situ EPR. <i>Topics in Catalysis</i> , 2015 , 58, 769-775	2.3	8
168	Highly selective transfer hydrogenation of functionalised nitroarenes using cobalt-based nanocatalysts. <i>Green Chemistry</i> , 2015 , 17, 898-902	10	109
167	Innenrücktitelbild: Selective Alcohol Oxidation by a Copper TEMPO Catalyst: Mechanistic Insights by Simultaneously Coupled Operando EPR/UV-Vis/ATR-IR Spectroscopy (<i>Angew. Chem.</i> 40/2015). <i>Angewandte Chemie</i> , 2015 , 127, 12043-12043	3.6	
166	Selective Alcohol Oxidation by a Copper TEMPO Catalyst: Mechanistic Insights by Simultaneously Coupled Operando EPR/UV-Vis/ATR-IR Spectroscopy. <i>Angewandte Chemie - International Edition</i> , 2015 , 54, 11791-4	16.4	55
165	Selective Alcohol Oxidation by a Copper TEMPO Catalyst: Mechanistic Insights by Simultaneously Coupled Operando EPR/UV-Vis/ATR-IR Spectroscopy. <i>Angewandte Chemie</i> , 2015 , 127, 11957-11960	3.6	25
164	New Insights into the Nature of Co-components and Their Impact on Pd Structure: X-ray Absorption Studies on Toluene Acetoxylation Catalysts. <i>Chemistry - A European Journal</i> , 2015 , 21, 15280-9	4.8	7
163	Cyclic Group 15 Radical Cations. <i>Angewandte Chemie - International Edition</i> , 2015 , 54, 7426-30	16.4	51
162	Cobalt-based nanocatalysts for green oxidation and hydrogenation processes. <i>Nature Protocols</i> , 2015 , 10, 916-26	18.8	96
161	A Model of a Closed Cycle of Water Splitting Using ansa-Titanocene(III/IV) Triflate Complexes. <i>Journal of the American Chemical Society</i> , 2015 , 137, 16187-95	16.4	12
160	Heterogeneous platinum-catalyzed C-H perfluoroalkylation of arenes and heteroarenes. <i>Angewandte Chemie - International Edition</i> , 2015 , 54, 4320-4	16.4	66
159	SCR and NO oxidation over Fe-ZSM-5 – The influence of the Fe content. <i>Catalysis Today</i> , 2015 , 258, 337-346	3.5	35
158	Highly selective visible light-induced Ti-O bond splitting in an ansa-titanocene dihydroxido complex. <i>Chemical Communications</i> , 2015 , 51, 3065-8	5.8	15
157	The effect of calcination temperature on structure and photocatalytic properties of Au/Pd nanoparticles supported on TiO ₂ . <i>Applied Catalysis B: Environmental</i> , 2014 , 152-153, 202-211	21.8	104

156	Oxidation and selective reduction of NO over Fe-ZSM-5 [How related are these reactions?]. <i>Journal of Catalysis</i> , 2014 , 311, 199-211	7.3	38
155	Spin density distribution after electron transfer from triethylamine to an [Ir(ppy) ₂ (bpy)] ⁺ photosensitizer during photocatalytic water reduction. <i>Physical Chemistry Chemical Physics</i> , 2014 , 16, 4789-96	3.6	37
154	Control of Bridging Ligands in [(V ₂ O ₃) ₂ (RXO ₃) ₄ F] ₂ Cage Complexes: A Unique Way To Tune Their Chemical Properties. <i>Organometallics</i> , 2014 , 33, 4905-4910	3.8	6
153	Advanced Charge Utilization from NaTaO ₃ Photocatalysts by Multilayer Reduced Graphene Oxide. <i>Chemistry of Materials</i> , 2014 , 26, 4705-4711	9.6	26
152	Synthesis and application of carbonated fatty acid esters from carbon dioxide including a life cycle analysis. <i>ChemSusChem</i> , 2014 , 7, 1133-9	8.3	47
151	Death and Rebirth: Photocatalytic Hydrogen Production by a Self-Organizing Copper/Iron System. <i>ACS Catalysis</i> , 2014 , 4, 1845-1849	13.1	71
150	Convenient and mild epoxidation of alkenes using heterogeneous cobalt oxide catalysts. <i>Angewandte Chemie - International Edition</i> , 2014 , 53, 4359-63	16.4	122
149	Ternary VZrAlON Oxynitrides - Efficient Catalysts for the Ammoxidation of 3-Picoline. <i>ACS Catalysis</i> , 2014 , 4, 2687-2695	13.1	4
148	Structure-Activity Relationships in Bulk Polymeric and Sol-Gel-Derived Carbon Nitrides during Photocatalytic Hydrogen Production. <i>Chemistry of Materials</i> , 2014 , 26, 1727-1733	9.6	84
147	TiO ₂ -anatase-supported oxorhenate catalysts prepared by oxidative redispersion of metal ReO ₄ for methanol conversion to methylal: A multi-technique in situ/operando study. <i>Comptes Rendus Chimie</i> , 2014 , 17, 808-817	2.7	5
146	Identifying active sites for fast NH ₃ -SCR of NO/NO ₂ mixtures over Fe-ZSM-5 by operando EPR and UV-vis spectroscopy. <i>Journal of Catalysis</i> , 2014 , 316, 103-111	7.3	88
145	Convenient and Mild Epoxidation of Alkenes Using Heterogeneous Cobalt Oxide Catalysts. <i>Angewandte Chemie</i> , 2014 , 126, 4448-4452	3.6	19
144	In Situ Non-Vibrational Characterization Techniques to Analyse Oxidation Catalysts and Mechanisms 2014 , 496-548		
143	Four-membered heterometallacyclic d ⁰ and d ¹ complexes of Group 4 metallocenes with amidato ligands. <i>Chemistry - A European Journal</i> , 2014 , 20, 7752-8	4.8	10
142	In-situ-EPR-Spektroskopie in der heterogenen Katalyse: Stiefkind oder Lichtblick?. <i>Chemie-Ingenieur-Technik</i> , 2014 , 86, 1871-1882	0.8	7
141	Methacrylic acid by carboxylation of propene with CO ₂ over POM catalysts [Reality or wishful thinking?]. <i>Catalysis Communications</i> , 2014 , 48, 19-23	3.2	2
140	In-situ Electron Paramagnetic Resonance of Powder Catalysts 2013 , 293-314		2
139	Selective reduction of amides to amines by boronic acid catalyzed hydrosilylation. <i>Angewandte Chemie - International Edition</i> , 2013 , 52, 11577-80	16.4	86

138	Synthesis of a functionalized chromane derivative via a TiCl ₄ -mediated cyclization reaction. <i>Monatshefte für Chemie</i> , 2013 , 144, 421-428	1.4	4
137	Hydrogen generation by water reduction with [Cp*(2) Ti(OTf)]: identifying elemental mechanistic steps by combined in situ FTIR and in situ EPR spectroscopy supported by DFT calculations. <i>Chemistry - A European Journal</i> , 2013 , 19, 13705-13	4.8	14
136	Nanoscale Fe ₂ O ₃ -based catalysts for selective hydrogenation of nitroarenes to anilines. <i>Science</i> , 2013 , 342, 1073-6	33.3	704
135	Water reduction with visible light: synergy between optical transitions and electron transfer in Au-TiO ₂ catalysts visualized by in situ EPR spectroscopy. <i>Angewandte Chemie - International Edition</i> , 2013 , 52, 11420-4	16.4	185
134	From sunflower oil toward 1,19-diester: Mechanistic elucidation. <i>Journal of Catalysis</i> , 2013 , 297, 44-55	7.3	24
133	Rutile TiO ₂ a superior support for highly selective and stable Pd-based catalysts in the gas-phase acetoxylation of toluene. <i>Journal of Catalysis</i> , 2013 , 297, 256-263	7.3	13
132	Formation, Operation and Deactivation of Cr Catalysts in Ethylene Tetramerization Directly Assessed by Operando EPR and XAS. <i>ACS Catalysis</i> , 2013 , 3, 95-102	13.1	61
131	The Impact of Reaction Pressure on the Catalytic Performance of the Pd/Sb/TiO ₂ Catalyst in the Acetoxylation of Toluene into Benzyl Acetate. <i>ChemCatChem</i> , 2013 , 5, 185-191	5.2	6
130	Identification of reaction intermediates in AlCl ₃ -mediated cyclocondensation reactions by simultaneous in situ ATR-FTIR and UV-vis spectroscopy. <i>Tetrahedron</i> , 2013 , 69, 3338-3347	2.4	6
129	Selective oxidation of alcohols to esters using heterogeneous Co ₃ O ₄ -N@C catalysts under mild conditions. <i>Journal of the American Chemical Society</i> , 2013 , 135, 10776-82	16.4	286
128	Heterogenized cobalt oxide catalysts for nitroarene reduction by pyrolysis of molecularly defined complexes. <i>Nature Chemistry</i> , 2013 , 5, 537-43	17.6	513
127	Molecular Level Insights into the Structure of Active Sites of VAlO Mixed Oxides in Propane Ammoxidation. <i>Journal of Physical Chemistry C</i> , 2013 , 117, 22926-22938	3.8	9
126	Wasserreduktion mit sichtbarem Licht: In-situ-EPR-Spektroskopie zeigt die Synergie zwischen optischen Übergängen und Elektronentransfer in Au-TiO ₂ -Katalysatoren. <i>Angewandte Chemie</i> , 2013 , 125, 11631-11635	3.6	22
125	Highly strained heterometallic cycles of Group 4 metallocenes with bis(diphenylphosphino)methanide ligands. <i>Chemistry - A European Journal</i> , 2013 , 19, 7568-74	4.8	8
124	A new view on the relations between tungsten and vanadium in V ₂ O ₅ WO ₃ /TiO ₂ catalysts for the selective reduction of NO with NH ₃ . <i>Journal of Catalysis</i> , 2012 , 286, 237-247	7.3	216
123	The influence of substituent effects on spectroscopic properties examined on benzylidene aniline-type imines. <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , 2012 , 95, 18-24	4.4	10
122	Lichtinduzierte Ti-O-Aktivierung in einem Decamethyltitanocendihydroxido-Komplex – Einblicke in die Elementarschritte der Wasserspaltung. <i>Angewandte Chemie</i> , 2012 , 124, 6377-6380	3.6	9
121	Catalytic properties of nitrated V/Al/O-mixed oxides in the ammoxidation of propane and new efficient preparation method for the catalysts. <i>Catalysis Today</i> , 2012 , 192, 10-15	5.3	3

120	Metal vanadate catalysts for the ammoxidation of 2-methylpyrazine to 2-cyanopyrazine. <i>Applied Catalysis A: General</i> , 2012 , 443-444, 111-118	5.1	18
119	Photoassisted Ti-O activation in a decamethyltitanocene dihydroxido complex: insights into the elemental steps of water splitting. <i>Angewandte Chemie - International Edition</i> , 2012 , 51, 6272-5	16.4	27
118	Tuning the electronic and spin complexity in organic-inorganic molecular hybrid compounds. <i>Chemistry - A European Journal</i> , 2012 , 18, 6433-6	4.8	7
117	Strong metal-support interaction as activity requirement of palladium-supported tin oxide sol-gel catalyst for water denitration. <i>International Journal of Environmental Science and Technology</i> , 2012 , 9, 235-246	3.3	3
116	Impact of phosphorus and nitrogen on structure and catalytic performance of VZrPON oxynitrides in the ammoxidation of 3-picoline. <i>Journal of Catalysis</i> , 2011 , 277, 196-207	7.3	13
115	Deactivation and regeneration studies of a PdSb/TiO ₂ catalyst used in the gas-phase acetoxylation of toluene. <i>Journal of Catalysis</i> , 2011 , 282, 103-111	7.3	11
114	Elucidating the Directing Effect of Lewis Acids on the Reaction Pathway in Formal [3+3] Cyclocondensation Reactions: A Comprehensive In Situ Spectroscopic Study. <i>ChemCatChem</i> , 2011 , 3, 1459-1468	5.2	7
113	Impact of Co-Components on the State of Pd and the Performance of Supported Pd/TiO ₂ Catalysts in the Gas-Phase Acetoxylation of Toluene. <i>ChemCatChem</i> , 2011 , 3, 1893-1901	5.2	8
112	Solid acid catalysts for dehydration of glycerol to acrolein in gas phase. <i>Journal of Materials Science</i> , 2011 , 46, 7160-7168	4.3	25
111	Optimization of Reaction Conditions and Regeneration Procedure of the PdSb/TiO ₂ Catalyst for Acetoxylation of Toluene. <i>Topics in Catalysis</i> , 2011 , 54, 1197-1205	2.3	3
110	Synthesis of Cp* ₂ Ti(OTf) ₂ and Its Reaction with Water. <i>European Journal of Inorganic Chemistry</i> , 2011 , 2011, 627-631	2.3	30
109	Einblicke in den Mechanismus der photokatalytischen Wasserreduktion durch DFT-gestützte In-situ-EPR/Raman-Spektroskopie. <i>Angewandte Chemie</i> , 2011 , 123, 10429-10433	3.6	19
108	Innenrücktitelbild: Einblicke in den Mechanismus der photokatalytischen Wasserreduktion durch DFT-gestützte In-situ-EPR/Raman-Spektroskopie (Angew. Chem. 43/2011). <i>Angewandte Chemie</i> , 2011 , 123, 10438-10438	3.6	
107	Insights into the mechanism of photocatalytic water reduction by DFT-supported in situ EPR/Raman spectroscopy. <i>Angewandte Chemie - International Edition</i> , 2011 , 50, 10246-50	16.4	53
106	Selective catalytic monoreduction of phthalimides and imidazolidine-2,4-diones. <i>Angewandte Chemie - International Edition</i> , 2011 , 50, 9180-4	16.4	94
105	Inside Back Cover: Insights into the Mechanism of Photocatalytic Water Reduction by DFT-Supported In Situ EPR/Raman Spectroscopy (Angew. Chem. Int. Ed. 43/2011). <i>Angewandte Chemie - International Edition</i> , 2011 , 50, 10256-10256	16.4	
104	Photocatalytic hydrogen generation from water with iron carbonyl phosphine complexes: improved water reduction catalysts and mechanistic insights. <i>Chemistry - A European Journal</i> , 2011 , 17, 6425-36	4.8	98
103	Spin exchange in solutions of TEMPOL in n-octanol and 1-methyl-3-octylimidazolium hexafluorophosphate in the temperature range from 300 to 500 K. <i>Journal of Physical Chemistry A</i> , 2011 , 115, 2939-52	2.8	13

102	Levitated Droplets as Model System for Spray Drying of Complex Oxides: A Simultaneous in Situ X-ray Diffraction/Raman Study. <i>Chemistry of Materials</i> , 2011 , 23, 5425-5431	9.6	16
101	Impact of redox properties on dehydration of glycerol to acrolein over heteropolyacids assessed by operando-EPR spectroscopy. <i>Applied Catalysis A: General</i> , 2011 , 391, 102-109	5.1	33
100	Key properties promoting high activity and stability of supported PdSb/TiO ₂ catalysts in the acetoxylation of toluene to benzyl acetate. <i>Applied Catalysis A: General</i> , 2011 , 398, 104-112	5.1	18
99	In situ EPR study of chemical reactions in Q-band at higher temperatures: a challenge for elucidating structure-reactivity relationships in catalysis. <i>Journal of the American Chemical Society</i> , 2010 , 132, 9873-80	16.4	16
98	In situ electron paramagnetic resonance: a unique tool for analyzing structure-reactivity relationships in heterogeneous catalysis. <i>Chemical Society Reviews</i> , 2010 , 39, 4673-84	58.5	85
97	Tailoring the synthesis of supported Pd catalysts towards desired structure and size of metal particles. <i>Physical Chemistry Chemical Physics</i> , 2010 , 12, 4833-42	3.6	15
96	Reaction Monitoring of Heterogeneously Catalyzed Hydrogenation of Imines by Coupled ATR-FTIR, UV/Vis, and Raman Spectroscopy. <i>ChemCatChem</i> , 2010 , 2, 273-280	5.2	35
95	On the nature and reactivity of active oxygen species formed from O ₂ and N ₂ O on VO _x /MCM-41 used for oxidative dehydrogenation of propane. <i>Journal of Catalysis</i> , 2010 , 274, 111-116	7.3	28
94	Inline-Monitoring von Hydrierungsreaktionen mittels ATR/UV-vis/Ramanspektroskopie. <i>Chemie-Ingenieur-Technik</i> , 2010 , 82, 1332-1332	0.8	
93	Flying droplets as model system for spray drying. An in situ synchrotron X-ray scattering study on complex oxides catalyst precursors. <i>Catalysis Today</i> , 2010 , 155, 326-330	5.3	6
92	The crystal structure of VVOPO ₄ and its relationship to VOPO ₄ . <i>Solid State Sciences</i> , 2009 , 11, 1258-1264	3.4	28
91	Bimetallic PdAu ₂ O ₃ /SiO ₂ catalysts for vinyl acetate monomer (VAM) synthesis: Insights into deactivation under industrial conditions. <i>Journal of Catalysis</i> , 2009 , 262, 314-323	7.3	31
90	Dynamics of redox behavior of nano-sized VO _x species over TiSi-MCM-41 from time-resolved in situ UV/Vis analysis. <i>Journal of Catalysis</i> , 2009 , 265, 8-18	7.3	40
89	The role of different Ni sites in supported nickel catalysts for butene dimerization under industry-like conditions. <i>Journal of Catalysis</i> , 2009 , 266, 120-128	7.3	42
88	Linking Simultaneous In Situ WAXS/SAXS/Raman with Raman/ATR/UV-Vis Spectroscopy: Comprehensive Insight into the Synthesis of Molybdate Catalyst Precursors. <i>Topics in Catalysis</i> , 2009 , 52, 1350-1359	2.3	35
87	Oxidation of alcohols using RuMnCe catalysts. <i>Applied Catalysis A: General</i> , 2009 , 366, 212-219	5.1	8
86	Vanadium-Containing Oxynitrides: Effective Catalysts for the Ammoxidation of 3-Picoline. <i>ChemCatChem</i> , 2009 , 1, 485-491	5.2	11
85	Green and efficient synthesis of sulfonamides catalyzed by nano-Ru/Fe(3)O(4). <i>Journal of the American Chemical Society</i> , 2009 , 131, 1775-9	16.4	215

84	The role of NO ₂ in the selective catalytic reduction of nitrogen oxides over Fe-ZSM-5 catalysts: Active sites for the conversion of NO and of NO/NO ₂ mixtures. <i>Journal of Catalysis</i> , 2008 , 259, 96-103	7.3	134
83	Monitoring Structure and Valence State of Chromium Sites during Catalyst Formation and Ethylene Oligomerization by in Situ EPR Spectroscopy. <i>Organometallics</i> , 2008 , 27, 3849-3856	3.8	60
82	Biomimetic iron-catalyzed asymmetric epoxidation of aromatic alkenes by using hydrogen peroxide. <i>Chemistry - A European Journal</i> , 2008 , 14, 7687-98	4.8	119
81	Deactivation and oxidative regeneration of VTiSbSiO _x catalyst for ammoxidation of 3-picoline to nicotinonitrile. <i>Applied Catalysis A: General</i> , 2008 , 335, 196-203	5.1	15
80	The role of Brønsted acidity in the SCR of NO over Fe-MFI catalysts. <i>Microporous and Mesoporous Materials</i> , 2008 , 111, 124-133	5.3	82
79	Nano-iron oxide-catalyzed selective oxidations of alcohols and olefins with hydrogen peroxide. <i>Journal of Molecular Catalysis A</i> , 2008 , 292, 28-35		103
78	Catalytic and Mechanistic Investigation of Polyaniline Supported PtO ₂ Nanoparticles: A Combined in situ/operando EPR, DRIFTS, and EXAFS Study. <i>Journal of Physical Chemistry C</i> , 2008 , 112, 19555-19559	3.8	23
77	Electron Paramagnetic Resonance: A Powerful Tool for Monitoring Working Catalysts. <i>Advances in Catalysis</i> , 2007 , 51, 265-308	2.4	17
76	Zentrenstruktur und Vergiftungswirkungen bei der selektiven katalytischen Reduktion von NO mit Ammoniak an Fe-ZSM-5-Katalysatoren. <i>Chemie-Ingenieur-Technik</i> , 2007 , 79, 871-877	0.8	4
75	Tuning catalytic activity between homogeneous and heterogeneous catalysis: improved activity and selectivity of free nano-Fe ₂ O ₃ in selective oxidations. <i>Angewandte Chemie - International Edition</i> , 2007 , 46, 8866-8	16.4	284
74	Novel biomimetic iron-catalysts for environmentally benign epoxidations of olefins. <i>Tetrahedron Letters</i> , 2007 , 48, 6339-6342	2	45
73	Structural evolution of H ₄ PVMo ₁₁ O ₄₀ ?xH ₂ O during calcination and isobutane oxidation: New insights into vanadium sites by a comprehensive in situ approach. <i>Journal of Catalysis</i> , 2007 , 245, 369-380	7.3	58
72	Temperature-dependent N ₂ O decomposition over Fe-ZSM-5: Identification of sites with different activity. <i>Journal of Catalysis</i> , 2007 , 249, 67-78	7.3	67
71	Structure-reactivity relationships in VO _x /TiO ₂ catalysts for the oxyhydrative scission of 1-butene and n-butane to acetic acid as examined by in situ-spectroscopic methods and catalytic tests. <i>Catalysis Today</i> , 2006 , 112, 78-81	5.3	6
70	Ru-catalyzed oxidation of primary alcohols. <i>Journal of Molecular Catalysis A</i> , 2006 , 246, 85-99		70
69	Selective reduction of NO with Fe-ZSM-5 catalysts of low Fe content: Part II. Assessing the function of different Fe sites by spectroscopic in situ studies. <i>Journal of Catalysis</i> , 2006 , 239, 173-186	7.3	170
68	Iron site modification upon alkaline treatment of Fe-ZSM-5 zeolites: Opportunities for improved N ₂ O decomposition activity. <i>Journal of Catalysis</i> , 2006 , 243, 212-216	7.3	37
67	Evidence of the vital role of the pore network on various catalytic conversions of N ₂ O over Fe-silicalite and Fe-SBA-15 with the same iron constitution. <i>Applied Catalysis B: Environmental</i> , 2006 , 62, 244-254	21.8	71

66	Alkaline treatment of iron-containing MFI zeolites. Influence on mesoporosity development and iron speciation. <i>Journal of Physical Chemistry B</i> , 2006 , 110, 20369-78	3.4	17
65	Simultaneous operando EPR/UV-vis/laser Raman spectroscopy – A powerful tool for monitoring transition metal oxide catalysts during reaction. <i>Catalysis Today</i> , 2006 , 113, 16-24	5.3	47
64	Spin exchange in vanadium-containing catalysts studied by in situ-EPR: a sensitive monitor for disorder-related activity. <i>Topics in Catalysis</i> , 2006 , 38, 133-139	2.3	18
63	Active sites for NO reduction over Fe-ZSM-5 catalysts. <i>Chemical Communications</i> , 2005 , 805-7	5.8	53
62	Killing three birds with one stone – simultaneous operando EPR/UV-vis/Raman spectroscopy for monitoring catalytic reactions. <i>Chemical Communications</i> , 2005 , 1761-3	5.8	54
61	Structure-activity relationships in supported VO _x catalysts for the oxyhydrative scission (OHS) of 1-butene and n-butane to acetic acid. <i>Catalysis Today</i> , 2005 , 99, 123-129	5.3	11
60	Selective reduction of NO with Fe-ZSM-5 catalysts of low Fe content. I. Relations between active site structure and catalytic performance. <i>Journal of Catalysis</i> , 2005 , 231, 314-330	7.3	258
59	Evolution of isomorphously substituted iron zeolites during activation: comparison of Fe-beta and Fe-ZSM-5. <i>Journal of Catalysis</i> , 2005 , 232, 318-334	7.3	220
58	Fe-ZSM-5-Katalysatoren für die Stickoxidminderung: Struktur-Aktivitäts-Beziehungen und Optimierungsstrategien. <i>Chemie-Ingenieur-Technik</i> , 2005 , 77, 1212-1213	0.8	
57	Fe-zsm-5 catalysts for the selective reduction of no: Influence of preparation route on structure and catalytic activity. <i>Studies in Surface Science and Catalysis</i> , 2004 , 154, 2484-2492	1.8	7
56	Deactivation kinetics of Ag/Al ₂ O ₃ catalyst for ethylene epoxidation. <i>Journal of Catalysis</i> , 2004 , 226, 334-342	7.3	17
55	On the nature of different iron sites and their catalytic role in Fe-ZSM-5 DeNO _x catalysts: new insights by a combined EPR and UV/VIS spectroscopic approach. <i>Journal of Catalysis</i> , 2004 , 227, 384-397	7.3	334
54	Combining accelerated activity tests and catalyst characterization: a time-saving way to study the deactivation of vinylacetate catalysts. <i>Applied Catalysis A: General</i> , 2004 , 268, 67-76	5.1	15
53	Reduction of N ₂ O with CO over FeMFI zeolites: influence of the preparation method on the iron species and catalytic behavior. <i>Journal of Catalysis</i> , 2004 , 223, 13-27	7.3	191
52	Deactivation of a commercial catalyst in the epoxidation of ethylene to ethylene oxide – Basis for accelerated testing. <i>Journal of Catalysis</i> , 2004 , 224, 187-196	7.3	20
51	Elucidating structure and function of active sites in VO _x /TiO ₂ catalysts during oxyhydrative scission of 1-butene by in situ and operando spectroscopy. <i>Applied Catalysis A: General</i> , 2004 , 269, 237-248	5.1	33
50	Structural Properties of Ag/TiO ₂ Catalysts for Acrolein Hydrogenation. <i>Journal of Physical Chemistry B</i> , 2004 , 108, 5709-5717	3.4	118
49	Looking on Heterogeneous Catalytic Systems from Different Perspectives: Multitechnique Approaches as a New Challenge for In Situ Studies. <i>Catalysis Reviews - Science and Engineering</i> , 2003 , 45, 97-150	12.6	97

48	Monitoring transition metal ions (TMI) in oxide catalysts during (re)action: the power of operando EPR. <i>Physical Chemistry Chemical Physics</i> , 2003 , 5, 4461-4472	3.6	34
47	Supported gold nanoparticles: in-depth catalyst characterization and application in hydrogenation and oxidation reactions. <i>Catalysis Today</i> , 2002 , 72, 63-78	5.3	278
46	Highly dispersed VOx species on mesoporous supports: Promising catalysts for the oxidative dehydrogenation (ODH) of propane. <i>Studies in Surface Science and Catalysis</i> , 2002 , 1141-1148	1.8	26
45	Transition metal oxide/carbon composite catalysts for n-alkane aromatization: structure and catalytic properties. <i>Applied Catalysis A: General</i> , 2001 , 208, 381-392	5.1	21
44	The Structure of Active Sites in MeVO Catalysts (Me = Mg, Zn, Pb) and Its Influence on the Catalytic Performance in the Oxidative Dehydrogenation (ODH) of Propane. <i>Journal of Catalysis</i> , 2001 , 202, 45-58	7.3	57
43	Fundamental and combinatorial approaches in the search for and optimisation of catalytic materials for the oxidative dehydrogenation of propane to propene. <i>Catalysis Today</i> , 2001 , 67, 369-378	5.3	91
42	NOx adsorption on MnO ₂ /NaY composite: an in situ FTIR and EPR study. <i>Applied Catalysis B: Environmental</i> , 2001 , 32, 229-241	21.8	75
41	Search and Optimization of Multi-Metal-Oxide Catalysts for the Oxidative Dehydrogenation of Propane - A Combinatorial and Fundamental Approach -. <i>Studies in Surface Science and Catalysis</i> , 2001 , 55-65	1.8	1
40	Synthesis and characterization of Fe ₂ O ₃ containing aluminas by thermal decomposition of modified ammonium dawsonite. <i>Journal of Materials Chemistry</i> , 2001 , 11, 2498-2503		16
39	Simultaneous combination of in situ-EPR/UV-VIS/on line GC: a novel setup for investigating transition metal oxide catalysts under working conditions. <i>Chemical Communications</i> , 2001 , 2122-3	5.8	44
38	Selective oxidation of p-substituted toluenes to the corresponding benzaldehydes over (VO) ₂ P ₂ O ₇ : an in situ FTIR and EPR study. <i>Journal of Molecular Catalysis A</i> , 2000 , 162, 391-399		15
37	A new approach to study the gas-phase oxidation of toluene: probing active sites in vanadia-based catalysts under working conditions. <i>Applied Catalysis A: General</i> , 2000 , 200, 287-297	5.1	35
36	Structure and Catalytic Properties of VOx/MCM Materials for the Partial Oxidation of Methane to Formaldehyde. <i>Journal of Catalysis</i> , 2000 , 191, 384-400	7.3	199
35	Selective oxidation of toluene to benzaldehyde: Investigation of structure-reactivity relationships by in situ-methods. <i>Studies in Surface Science and Catalysis</i> , 2000 , 359-364	1.8	8
34	Supported Gold Nanoparticles from Quantum Dot to Mesoscopic Size Scale: Effect of Electronic and Structural Properties on Catalytic Hydrogenation of Conjugated Functional Groups. <i>Journal of the American Chemical Society</i> , 2000 , 122, 11430-11439	16.4	350
33	The structure of catalytically active vanadium sites in V ₅ B ₂ oxides: an EPR study of asynthesized and tungsten promoted working catalysts. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , 1999 , 158, 107-113	5.1	9
32	In situ investigation of active sites in zirconia-supported chromium oxide catalysts during the aromatization of n-octane. <i>Catalysis Letters</i> , 1999 , 60, 183-189	2.8	29
31	Catalytic performance of vanadyl pyrophosphate in the partial oxidation of toluene to benzaldehyde. <i>Catalysis Letters</i> , 1999 , 59, 61-65	2.8	32

30	Permanent blockade of in situ-generated acid Brüstet sites of vanadyl pyrophosphate catalysts by pyridine during the partial oxidation of toluene. <i>Chemical Communications</i> , 1999 , 1169-1170	5.8	17
29	Investigations of alkali doped Fe ₂ O ₃ -V ₂ O ₅ catalysts by transmission and conversion electron Mössbauer spectroscopy 1998 , 111, 51-56		11
28	Selective Catalytic Reduction of NO by NH ₃ over Vanadium-Containing Zeolites. <i>Journal of Catalysis</i> , 1998 , 175, 48-61	7.3	43
27	Amoxidation of toluene on vanadyl polyphosphates-VO(PO ₃) ₂ , 1. synthesis and characterization of the parent samples. <i>Reaction Kinetics and Catalysis Letters</i> , 1998 , 63, 225-233		4
26	Amoxidation of toluene on vanadyl polyphosphates-VO(PO ₃) ₂ , 2. Catalytic properties. <i>Reaction Kinetics and Catalysis Letters</i> , 1998 , 63, 245-251		8
25	The incorporation of iron ions in AlPO ₄ -5 molecular sieves after microwave synthesis studied by EPR and Mössbauer spectroscopy. <i>Microporous and Mesoporous Materials</i> , 1998 , 20, 207-215	5.3	41
24	Structure of vanadium sites in VPO catalysts and their influence on the catalytic performance in selective O- and N-insertion reactions. <i>Journal of the Chemical Society, Faraday Transactions</i> , 1998 , 94, 2221-2225		22
23	Investigation of zeolites by photoelectron and ion scattering spectroscopy Part IV XPS studies of vanadium-modified zeolites. <i>Journal of the Chemical Society, Faraday Transactions</i> , 1998 , 94, 2033-2041		26
22	Amoxidation of methylaromatics over NH ₄ ⁺ -containing vanadium phosphate catalysts New mechanistic insights. <i>Studies in Surface Science and Catalysis</i> , 1997 , 108, 377-384	1.8	7
21	Coupled vanadyl centres in vanadium phosphorus oxide catalysts: Essential structural units for effective catalytic performance in the amoxidation of methylaromatics. <i>Studies in Surface Science and Catalysis</i> , 1997 , 110, 919-928	1.8	10
20	Characterisation of the active phase in caesium-doped iron-vanadium-oxide catalysts for the selective oxidation of polyaromatics. <i>Catalysis Letters</i> , 1997 , 43, 107-115	2.8	4
19	Preparation, structural properties and catalytic selectivity of sulfate-doped (VO) ₂ P ₂ O ₇ catalysts in the oxidation of n-butane. <i>Catalysis Letters</i> , 1997 , 46, 113-118	2.8	3
18	Selective gas-phase oxidation of polycyclic aromatic hydrocarbons on vanadium oxide-based catalysts. <i>Applied Catalysis A: General</i> , 1997 , 157, 311-334	5.1	36
17	Amoxidation von Toluol an NH ₄ ⁺ -haltigen Vanadiumphosphat-Katalysatoren. <i>Chemie-Ingenieur-Technik</i> , 1997 , 69, 97-99	0.8	3
16	Investigation of vanadium phosphorus oxide catalysts (VPO) during toluene amoxidation: new mechanistic insights by in situ EPR. <i>Journal of the Chemical Society, Faraday Transactions</i> , 1996 , 92, 4257-4263		33
15	Further studies of the active phase in Cs-doped Fe ₂ W ₂ O ₁₂ oxide catalysts. <i>Chemical Communications</i> , 1996 , 239-240	5.8	1
14	In-situ electron spin resonance study of vanadium phosphate catalysts during the selective oxidation of n-butane to maleic anhydride. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , 1996 , 115, 179-186	5.1	25
13	Microwave synthesis of and MnAPO-5-stability of Mn ²⁺ ions on framework positions. <i>Microporous Materials</i> , 1996 , 7, 139-149		34

12	In situ-electron spin resonance: a useful tool for the investigation of vanadium phosphate catalysts (VPO) under working conditions. <i>Catalysis Today</i> , 1996 , 32, 215-222	5.3	41
11	New Aspects of Solid State Transformation of Vanadium phosphates Used as Catalysts for Selective Oxidation or Ammoxidation reactions. <i>Phosphorus, Sulfur and Silicon and the Related Elements</i> , 1996 , 109, 55-58	1	
10	On the Nature of the Active Species in Cesium-Doped V ₂ O ₅ -Fe ₂ O ₃ Catalysts. <i>Journal of Catalysis</i> , 1995 , 154, 11-23	7.3	14
9	Synthesis and characterization of VAPSO-44 and VAPSO-5. <i>Journal of the Chemical Society, Faraday Transactions</i> , 1995 , 91, 1173-1178		23
8	Redox interaction of ammonia with (VO) ₂ P ₂ O ₇ . <i>Journal of the Chemical Society, Faraday Transactions</i> , 1995 , 91, 725-731		28
7	EPR studies of caesium-doped V ₂ O ₅ -Fe ₂ O ₃ catalysts: new evidence for active centres. <i>Journal of the Chemical Society, Faraday Transactions</i> , 1994 , 90, 3159-3165		9
6	Thermisch induzierte Bewegungsvorgänge in kristallinen Guanidiniumhexafluorometallaten, (C(NH ₂) ₃) ₃ MF ₆ (M = Al, Ga, In) Eine in situ ESR-Untersuchung. <i>Zeitschrift Fur Anorganische Und Allgemeine Chemie</i> , 1992 , 617, 155-160	1.3	
5	E.p.r. study on the incorporation of Fe(III) ions in ZSM-5 zeolites in dependence on the preparation conditions. <i>Zeolites</i> , 1992 , 12, 380-385		52
4	Investigation of redox reactions proceeding during the hardening process of sulfide containing cement. <i>Cement and Concrete Research</i> , 1992 , 22, 1161-1169	10.3	9
3	Zur Kenntnis einer Hochtemperaturmodifikation des Bleidiphosphats, Pb ₂ P ₂ O ₇ . <i>Zeitschrift Fur Anorganische Und Allgemeine Chemie</i> , 1990 , 584, 173-177	1.3	1
2	Zur Bildung von Difluorhalogenmethylarsanen durch Reaktion von Difluorcarben mit Arsenhalogeniden. <i>Zeitschrift Fur Anorganische Und Allgemeine Chemie</i> , 1990 , 588, 26-32	1.3	6
1	Chapter 1: In situ electron paramagnetic resonance (EPR) is a unique tool for analysing structure and reaction behaviour of paramagnetic sites in model and real catalysts. <i>Catalysis</i> , 1-32	1.6	17