

Israel E Wachs

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.

343
papers

29,590
citations

99
h-index

158
g-index

363
ext. papers

31,881
ext. citations

7.8
avg, IF

7.46
L-index

#	Paper	IF	Citations
343	Number of surface sites and turnover frequencies for oxide catalysts. <i>Journal of Catalysis</i> , 2022 , 405, 462-472	7.3	1
342	The effect of non-redox promoters (AlOx, POx, SiOx and ZrOx) and surface sulfates on supported V2O5-WO3/TiO2 catalysts in selective catalytic reduction of NO with NH3. <i>Applied Catalysis B: Environmental</i> , 2022 , 306, 121128	21.8	0
341	Effect of redox promoters (CeOx and CuOx) and surface sulfates on the selective catalytic reduction (SCR) of NO with NH3 by supported V2O5-WO3/TiO2 catalysts. <i>Applied Catalysis B: Environmental</i> , 2022 , 306, 121108	21.8	4
340	Molecular Design of Supported MoOx Catalysts with Surface TaOx Promotion for Olefin Metathesis. <i>ACS Catalysis</i> , 2022 , 12, 3226-3237	13.1	1
339	Redox Dynamics of Active VO Sites Promoted by TiO during Oxidative Dehydrogenation of Ethanol Detected by Quick XAS.. <i>Jacs Au</i> , 2022 , 2, 762-776		4
338	A combined computational and experimental study of methane activation during oxidative coupling of methane (OCM) by surface metal oxide catalysts. <i>Chemical Science</i> , 2021 , 12, 14143-14158	9.4	1
337	Role of chromium in CrBe oxide catalysts for high temperature water-gas shift reaction [A DFT study. <i>International Journal of Hydrogen Energy</i> , 2021 , 46, 17154-17162	6.7	2
336	Experimental methods in chemical engineering: Temperature programmed surface reaction spectroscopy [PSR. <i>Canadian Journal of Chemical Engineering</i> , 2021 , 99, 423-434	2.3	2
335	Identifying the Catalytic Active Site for Propylene Metathesis by Supported ReOx Catalysts. <i>ACS Catalysis</i> , 2021 , 11, 1962-1976	13.1	3
334	Tuning the Number of Active Sites and Turnover Frequencies by Surface Modification of Supported ReO4/(SiO2Al2O3) Catalysts for Olefin Metathesis. <i>ACS Catalysis</i> , 2021 , 11, 2412-2421	13.1	4
333	Impact of Hydration on Supported V2O5/TiO2 Catalysts as Explored by Magnetic Resonance Spectroscopy. <i>Journal of Physical Chemistry C</i> , 2021 , 125, 16766-16775	3.8	1
332	Elucidating the Effects of Mn Promotion on SiO2-Supported Na-Promoted Tungsten Oxide Catalysts for Oxidative Coupling of Methane (OCM). <i>ACS Catalysis</i> , 2021 , 11, 10131-10137	13.1	7
331	New Mechanistic and Reaction Pathway Insights for Oxidative Coupling of Methane (OCM) over Supported Na WO /SiO Catalysts. <i>Angewandte Chemie - International Edition</i> , 2021 , 60, 21502-21511	16.4	12
330	New Mechanistic and Reaction Pathway Insights for Oxidative Coupling of Methane (OCM) over Supported Na2WO4/SiO2 Catalysts. <i>Angewandte Chemie</i> , 2021 , 133, 21672-21681	3.6	1
329	Formation and influence of surface hydroxyls on product selectivity during CO2 hydrogenation by Ni/SiO2 catalysts. <i>Journal of Catalysis</i> , 2021 , 400, 228-233	7.3	4
328	Resolving the Types and Origin of Active Oxygen Species Present in Supported Mn-Na2WO4/SiO2 Catalysts for Oxidative Coupling of Methane. <i>ACS Catalysis</i> , 2021 , 11, 10288-10293	13.1	9
327	StructureActivity Relationships of Hydrothermally Aged Titania-Supported VanadiumTungsten Oxide Catalysts for SCR of NOx Emissions with NH3. <i>ACS Catalysis</i> , 2021 , 11, 12096-12111	13.1	4

326	Methane activation by ZSM-5-supported transition metal centers. <i>Chemical Society Reviews</i> , 2021 , 50, 1251-1268	58.5	34
325	Nature of Reactive Oxygen Intermediates on Copper-Promoted Iron-Chromium Oxide Catalysts during CO ₂ Activation. <i>ACS Catalysis</i> , 2020 , 10, 7857-7863	13.1	25
324	Existence and Properties of Isolated Catalytic Sites on the Surface of β -Cristobalite-Supported, Doped Tungsten Oxide Catalysts (WO _x / β -SiO ₂ , Na-WO _x / β -SiO ₂ , Mn-WO _x / β -SiO ₂) for Oxidative Coupling of Methane (OCM): A Combined Periodic DFT and Experimental Study. <i>ACS Catalysis</i> , 2020 , 10, 4580-4592	13.1	22
323	Probing the surface of promoted CuO-Cr ₂ O ₃ -Fe ₂ O ₃ catalysts during CO ₂ activation. <i>Applied Catalysis B: Environmental</i> , 2020 , 271, 118943	21.8	11
322	Synthesis and molecular structure of model silica-supported tungsten oxide catalysts for oxidative coupling of methane (OCM). <i>Catalysis Science and Technology</i> , 2020 , 10, 3334-3345	5.5	22
321	Role of Local Structure on Catalytic Reactivity: Comparison of Methanol Oxidation by Aqueous Bioinorganic Enzyme Mimic (Vanadium Haloperoxidase) and Vanadia-Based Heterogeneous Catalyst (Supported VO ₄ /SiO ₂). <i>ACS Catalysis</i> , 2020 , 10, 1566-1574	13.1	3
320	Initial Steps in the Selective Catalytic Reduction of NO with NH ₃ by TiO ₂ -Supported Vanadium Oxides. <i>ACS Catalysis</i> , 2020 , 10, 13918-13931	13.1	10
319	Activation and deactivation of the commercial-type CuO-Cr ₂ O ₃ -Fe ₂ O ₃ high temperature shift catalyst. <i>AIChE Journal</i> , 2020 , 66, e16846	3.6	9
318	Cr-Free, Cu Promoted Fe Oxide-Based Catalysts for High-Temperature Water-Gas Shift (HT-WGS) Reaction. <i>Catalysts</i> , 2020 , 10, 305	4	6
317	Innenrücktitelbild: Mechanism by which Tungsten Oxide Promotes the Activity of Supported V ₂ O ₅ /TiO ₂ Catalysts for NO _x Abatement: Structural Effects Revealed by 51V MAS NMR Spectroscopy (Angew. Chem. 36/2019). <i>Angewandte Chemie</i> , 2019 , 131, 12847-12847	3.6	0
316	Oxidative Coupling of Methane (OCM) by SiO ₂ -Supported Tungsten Oxide Catalysts Promoted with Mn and Na. <i>ACS Catalysis</i> , 2019 , 9, 5912-5928	13.1	86
315	Strong Metal-Support Interactions between Copper and Iron Oxide during the High-Temperature Water-Gas Shift Reaction. <i>Angewandte Chemie - International Edition</i> , 2019 , 58, 9083-9087	16.4	50
314	Strong Metal-Support Interactions between Copper and Iron Oxide during the High-Temperature Water-Gas Shift Reaction. <i>Angewandte Chemie</i> , 2019 , 131, 9181-9185	3.6	12
313	Activation Mechanism and Surface Intermediates during Olefin Metathesis by Supported MoO _x /Al ₂ O ₃ Catalysts. <i>Journal of Physical Chemistry C</i> , 2019 , 123, 12367-12375	3.8	8
312	Elucidation of the Reaction Mechanism for High-Temperature Water Gas Shift over an Industrial-Type Copper-Chromium-Iron Oxide Catalyst. <i>Journal of the American Chemical Society</i> , 2019 , 141, 7990-7999	16.4	33
311	Molybdenum Oxide, Oxycarbide, and Carbide: Controlling the Dynamic Composition, Size, and Catalytic Activity of Zeolite-Supported Nanostructures. <i>Journal of Physical Chemistry C</i> , 2019 , 123, 22281-22292	3.8	24
310	Mechanism by which Tungsten Oxide Promotes the Activity of Supported V ₂ O ₅ /TiO ₂ Catalysts for NO Abatement: Structural Effects Revealed by V MAS NMR Spectroscopy. <i>Angewandte Chemie - International Edition</i> , 2019 , 58, 12609-12616	16.4	48
309	Mechanism by which Tungsten Oxide Promotes the Activity of Supported V ₂ O ₅ /TiO ₂ Catalysts for NO _x Abatement: Structural Effects Revealed by 51V MAS NMR Spectroscopy. <i>Angewandte Chemie</i> , 2019 , 131, 12739-12746	3.6	30

308	Overview of Selective Oxidation of Ethylene to Ethylene Oxide by Ag Catalysts. <i>ACS Catalysis</i> , 2019 , 9, 10727-10750	13.1	52
307	Critical review on the active site structure of sulfated zirconia catalysts and prospects in fuel production. <i>Applied Catalysis A: General</i> , 2019 , 572, 210-225	5.1	39
306	Proof of Equivalent Catalytic Functionality upon Photon-Induced and Thermal Activation of Supported Isolated Vanadia Species in Methanol Oxidation. <i>ChemCatChem</i> , 2018 , 10, 2360-2364	5.2	9
305	Molecular Structure-Reactivity Relationships for Olefin Metathesis by Al ₂ O ₃ -Supported Surface MoO _x Sites. <i>ACS Catalysis</i> , 2018 , 8, 949-959	13.1	37
304	Molecular structure and sour gas surface chemistry of supported K ₂ O/WO ₃ /Al ₂ O ₃ catalysts. <i>Applied Catalysis B: Environmental</i> , 2018 , 232, 146-154	21.8	17
303	Revealing structure-activity relationships in chromium free high temperature shift catalysts promoted by earth abundant elements. <i>Applied Catalysis B: Environmental</i> , 2018 , 232, 205-212	21.8	18
302	A perspective on chromium-free iron oxide-based catalysts for high temperature water-gas shift reaction. <i>Catalysis Today</i> , 2018 , 311, 2-7	5.3	16
301	Nature of surface oxygen intermediates on TiO ₂ during photocatalytic splitting of water. <i>Chinese Chemical Letters</i> , 2018 , 29, 769-772	8.1	12
300	Photocatalytic Methanol Oxidation by Supported Vanadium Oxide Species: Influence of Support and Degree of Oligomerization. <i>European Journal of Inorganic Chemistry</i> , 2018 , 2018, 3725-3735	2.3	8
299	A Perspective on the Selective Catalytic Reduction (SCR) of NO with NH ₃ by Supported V ₂ O ₅ /WO ₃ /TiO ₂ Catalysts. <i>ACS Catalysis</i> , 2018 , 8, 6537-6551	13.1	197
298	Proof of Equivalent Catalytic Functionality upon Photon-Induced and Thermal Activation of Supported Isolated Vanadia Species in Methanol Oxidation. <i>ChemCatChem</i> , 2018 , 10, 2325-2325	5.2	
297	Anatomy of a Visible Light Activated Photocatalyst for Water Splitting. <i>ACS Catalysis</i> , 2018 , 8, 6650-6658	13.1	19
296	Formation of N ₂ O greenhouse gas during SCR of NO with NH ₃ by supported vanadium oxide catalysts. <i>Applied Catalysis B: Environmental</i> , 2018 , 224, 836-840	21.8	39
295	Pyrolysis of the Cellulose Fraction of Biomass in the Presence of Solid Acid Catalysts: An Operando Spectroscopy and Theoretical Investigation. <i>ChemSusChem</i> , 2018 , 11, 4044-4059	8.3	5
294	Investigation of Silica-Supported Vanadium Oxide Catalysts by High-Field 51V Magic-Angle Spinning NMR. <i>Journal of Physical Chemistry C</i> , 2017 , 121, 6246-6254	3.8	28
293	Nature of Catalytically Active Sites in the Supported WO ₃ /ZrO ₂ Solid Acid System: A Current Perspective. <i>ACS Catalysis</i> , 2017 , 7, 2181-2198	13.1	54
292	Catalyst Activation and Kinetics for Propylene Metathesis by Supported WO _x /SiO ₂ Catalysts. <i>ACS Catalysis</i> , 2017 , 7, 573-580	13.1	25
291	A decade+ of operando spectroscopy studies. <i>Catalysis Today</i> , 2017 , 283, 27-53	5.3	90

290	Nature of Active Sites and Surface Intermediates during SCR of NO with NH ₃ by Supported V ₂ O ₅ /WO ₃ /TiO ₂ Catalysts. <i>Journal of the American Chemical Society</i> , 2017 , 139, 15624-15627	16.4	155
289	Vibrational Spectroscopy of Oxide Overlayers. <i>Topics in Catalysis</i> , 2017 , 60, 1577-1617	2.3	31
288	Reaction Pathways and Kinetics for Selective Catalytic Reduction (SCR) of Acidic NO _x Emissions from Power Plants with NH ₃ . <i>ACS Catalysis</i> , 2017 , 7, 8358-8361	13.1	49
287	Surface Structure and Photocatalytic Properties of Bi ₂ WO ₆ Nanoplatelets Modified by Molybdena Islands from Chemical Vapor Deposition. <i>Journal of Physical Chemistry C</i> , 2016 , 120, 18191-18200	3.8	20
286	Promotion Mechanisms of Iron Oxide-Based High Temperature Water-Gas Shift Catalysts by Chromium and Copper. <i>ACS Catalysis</i> , 2016 , 6, 4455-4464	13.1	74
285	Dynamics of CrO ₃ /Fe ₂ O ₃ Catalysts during the High-Temperature Water-Gas Shift Reaction: Molecular Structures and Reactivity. <i>ACS Catalysis</i> , 2016 , 6, 4786-4798	13.1	55
284	Iron-Based Catalysts for the High-Temperature Water-Gas Shift (HT-WGS) Reaction: A Review. <i>ACS Catalysis</i> , 2016 , 6, 722-732	13.1	181
283	Reaction Mechanism and Kinetics of Olefin Metathesis by Supported ReO _x /Al ₂ O ₃ Catalysts. <i>ACS Catalysis</i> , 2016 , 6, 272-278	13.1	16
282	Revisiting formic acid decomposition on metallic powder catalysts: Exploding the HCOOH decomposition volcano curve. <i>Surface Science</i> , 2016 , 650, 103-110	1.8	34
281	Selective catalytic reduction of NO by NH ₃ with WO ₃ -TiO ₂ catalysts: Influence of catalyst synthesis method. <i>Applied Catalysis B: Environmental</i> , 2016 , 188, 123-133	21.8	43
280	Determining Number of Active Sites and TOF for the High-Temperature Water Gas Shift Reaction by Iron Oxide-Based Catalysts. <i>ACS Catalysis</i> , 2016 , 6, 1764-1767	13.1	26
279	Analysis of corrosion layers in ancient Roman silver coins with high resolution surface spectroscopic techniques. <i>Applied Surface Science</i> , 2016 , 376, 241-251	6.7	15
278	Resolving the Reaction Mechanism for H ₂ Formation from High-Temperature Water-Gas Shift by Chromium-Iron Oxide Catalysts. <i>ACS Catalysis</i> , 2016 , 6, 2827-2830	13.1	32
277	Operando Molecular Spectroscopy During Ethylene Polymerization by Supported CrO _x /SiO ₂ Catalysts: Active Sites, Reaction Intermediates, and Structure-Activity Relationship. <i>Topics in Catalysis</i> , 2016 , 59, 725-739	2.3	43
276	Nature of WO _x Sites on SiO ₂ and Their Molecular Structure-Reactivity/Selectivity Relationships for Propylene Metathesis. <i>ACS Catalysis</i> , 2016 , 6, 3061-3071	13.1	66
275	Influence of catalyst synthesis method on selective catalytic reduction (SCR) of NO by NH ₃ with V ₂ O ₅ -WO ₃ /TiO ₂ catalysts. <i>Applied Catalysis B: Environmental</i> , 2016 , 193, 141-150	21.8	93
274	Catalysis by Mixed Oxides. <i>Catalysis Today</i> , 2016 , 277, 201	5.3	2
273	Spectroscopic and Computational Study of Cr Oxide Structures and Their Anchoring Sites on ZSM-5 Zeolites. <i>ACS Catalysis</i> , 2015 , 5, 3078-3092	13.1	55

272	The Nature of Surface CrOx Sites on SiO2 in Different Environments. <i>Catalysis Letters</i> , 2015 , 145, 985-994	4.8	32
271	Catalysis. Identification of molybdenum oxide nanostructures on zeolites for natural gas conversion. <i>Science</i> , 2015 , 348, 686-90	33.3	242
270	Activation of Surface ReOx Sites on Al2O3 Catalysts for Olefin Metathesis. <i>ACS Catalysis</i> , 2015 , 5, 6807-6814	6.14	22
269	Determination of Number of Activated Sites Present during Olefin Metathesis by Supported ReOx/Al2O3 Catalysts. <i>ACS Catalysis</i> , 2015 , 5, 6823-6827	13.1	10
268	Surface ReOx Sites on Al2O3 and Their Molecular Structure-Reactivity Relationships for Olefin Metathesis. <i>ACS Catalysis</i> , 2015 , 5, 1432-1444	13.1	53
267	Monitoring solid oxide CO2 capture sorbents in action. <i>ChemSusChem</i> , 2014 , 7, 3459-66	8.3	32
266	Olefin Metathesis by Supported Metal Oxide Catalysts. <i>ACS Catalysis</i> , 2014 , 4, 2505-2520	13.1	187
265	Critical Literature Review of the Kinetics for the Oxidative Dehydrogenation of Propane over Well-Defined Supported Vanadium Oxide Catalysts. <i>ACS Catalysis</i> , 2014 , 4, 3357-3380	13.1	343
264	Structure of Mo2Cx and Mo4Cx Molybdenum Carbide Nanoparticles and Their Anchoring Sites on ZSM-5 Zeolites. <i>Journal of Physical Chemistry C</i> , 2014 , 118, 4670-4679	3.8	67
263	In Situ and Operando Raman Spectroscopy of Oxidation Catalysts	2014, 420-446	2
262	How strain affects the reactivity of surface metal oxide catalysts. <i>Angewandte Chemie - International Edition</i> , 2013 , 52, 13553-7	16.4	107
261	Reporting of Reactivity for Heterogeneous Photocatalysis. <i>ACS Catalysis</i> , 2013 , 3, 2606-2611	13.1	42
260	Catalysis science of supported vanadium oxide catalysts. <i>Dalton Transactions</i> , 2013 , 42, 11762-9	4.3	255
259	Anomalous reactivity of supported V2O5 nanoparticles for propane oxidative dehydrogenation: influence of the vanadium oxide precursor. <i>Dalton Transactions</i> , 2013 , 42, 12644-53	4.3	81
258	Nature of Catalytic Active Sites Present on the Surface of Advanced Bulk Tantalum Mixed Oxide Photocatalysts. <i>ACS Catalysis</i> , 2013 , 3, 2920-2929	13.1	49
257	Fundamental Bulk/Surface Structure-Photoactivity Relationships of Supported (Rh2/CrO3)/GaN Photocatalysts. <i>Journal of Physical Chemistry Letters</i> , 2013 , 4, 3719-3724	6.4	27
256	Der Einfluss von strukturellen Spannungen auf die Reaktivität von getragenen Metalloxidkatalysatoren. <i>Angewandte Chemie</i> , 2013 , 125, 13796-13800	3.6	20
255	Nanostructural and chemical characterization of supported metal oxide catalysts by aberration corrected analytical electron microscopy. <i>Current Opinion in Solid State and Materials Science</i> , 2012 , 16, 10-22	12	52

254	Spectroscopic Characterization of Mixed Fe ^{II} /Li Oxide Electrocatalysts for the Oxygen Evolution Reaction in Alkaline Electrolytes. <i>ACS Catalysis</i> , 2012 , 2, 1793-1801	13.1	362
253	Catalysis Science of Bulk Mixed Oxides. <i>ACS Catalysis</i> , 2012 , 2, 1235-1246	13.1	157
252	Catalysis Science of Methanol Oxidation over Iron Vanadate Catalysts: Nature of the Catalytic Active Sites. <i>ACS Catalysis</i> , 2011 , 1, 54-66	13.1	107
251	Aberration-corrected Analytical Microscopy Characterization of Double-Supported WO ₃ /TiO ₂ /SiO ₂ Solid Acid Catalysts. <i>ChemCatChem</i> , 2011 , 3, 1045-1050	5.2	4
250	Dynamic Surface Structures and Reactivity of Vanadium-Containing Molybdophosphoric Acid (H ₃ +xPMo ₁₂ V _x O ₄₀) Keggin Catalysts during Methanol Oxidation and Dehydration. <i>ACS Catalysis</i> , 2011 , 1, 1536-1548	13.1	45
249	The generality of surface vanadium oxide phases in mixed oxide catalysts. <i>Applied Catalysis A: General</i> , 2011 , 391, 36-42	5.1	60
248	Characterization of Hydrothermally Prepared Titanate Nanotube Powders by Ambient and In Situ Raman Spectroscopy. <i>Journal of Physical Chemistry Letters</i> , 2010 , 1, 130-135	6.4	57
247	Presence of surface vanadium peroxo-oxo umbrella structures in supported vanadium oxide catalysts: fact or fiction?. <i>Journal of the American Chemical Society</i> , 2010 , 132, 12559-61	16.4	48
246	Relating n-pentane isomerization activity to the tungsten surface density of WO(x)/ZrO ₂ . <i>Journal of the American Chemical Society</i> , 2010 , 132, 13462-71	16.4	84
245	Molecular Structural Determination of Molybdena in Different Environments: Aqueous Solutions, Bulk Mixed Oxides, and Supported MoO ₃ Catalysts. <i>Journal of Physical Chemistry C</i> , 2010 , 114, 14110-14120	3.8	115
244	Monitoring surface metal oxide catalytic active sites with Raman spectroscopy. <i>Chemical Society Reviews</i> , 2010 , 39, 5002-17	58.5	226
243	Raman Spectroscopy of Catalysts 2010 ,		1
242	Origin of the synergistic interaction between MoO ₃ and iron molybdate for the selective oxidation of methanol to formaldehyde. <i>Journal of Catalysis</i> , 2010 , 275, 84-98	7.3	96
241	Anomale Oberflächenzusammensetzung stöchiometrischer Mischoxid-Verbindungen. <i>Angewandte Chemie</i> , 2010 , 122, 8212-8216	3.6	4
240	Anomalous surface compositions of stoichiometric mixed oxide compounds. <i>Angewandte Chemie - International Edition</i> , 2010 , 49, 8037-41	16.4	35
239	Tuning the electronic and molecular structures of catalytic active sites with titania nanoligands. <i>Journal of the American Chemical Society</i> , 2009 , 131, 680-7	16.4	41
238	Identification of active Zr-WO(x) clusters on a ZrO ₂ support for solid acid catalysts. <i>Nature Chemistry</i> , 2009 , 1, 722-8	17.6	123
237	Applications of High Sensitivity-Low Energy Ion Scattering (HS-LEIS) in heterogeneous catalysis. <i>Catalysis Today</i> , 2009 , 140, 197-201	5.3	62

236	Insights into Oxygen Exchange Between Gaseous O ₂ and Supported Vanadium Oxide Catalysts via 17O NMR. <i>Chemistry of Materials</i> , 2009 , 21, 4127-4134	9.6	12
235	Surface and bulk aspects of mixed oxide catalytic nanoparticles: oxidation and dehydration of CH(3)OH by polyoxometallates. <i>Journal of the American Chemical Society</i> , 2009 , 131, 15544-54	16.4	75
234	Microstructural Development of Supported Pt/ZrO ₂ /SiO ₂ Catalysts: The Effect of ZrO ₂ Nanoligands. <i>Microscopy and Microanalysis</i> , 2009 , 15, 1414-1415	0.5	
233	CH ₃ OH oxidation over well-defined supported V ₂ O ₅ /Al ₂ O ₃ catalysts: Influence of vanadium oxide loading and surface vanadium-oxygen functionalities. <i>Journal of Catalysis</i> , 2008 , 255, 197-205	7.3	104
232	New insights into the nature of the acidic catalytic active sites present in ZrO ₂ -supported tungsten oxide catalysts. <i>Journal of Catalysis</i> , 2008 , 256, 108-125	7.3	176
231	Is there a relationship between the MO bond length (strength) of bulk mixed metal oxides and their catalytic activity?. <i>Journal of Catalysis</i> , 2008 , 256, 145-153	7.3	39
230	Selective oxidation of propylene over model supported V ₂ O ₅ catalysts: Influence of surface vanadia coverage and oxide support. <i>Journal of Catalysis</i> , 2008 , 257, 181-189	7.3	54
229	Surface chemistry and reactivity of well-defined multilayered supported M ₁ O _x /M ₂ O _x /SiO ₂ catalysts. <i>Journal of Catalysis</i> , 2008 , 258, 103-110	7.3	25
228	Structural Characterization of WO ₃ /ZrO ₂ Catalysts using HAADF Imaging. <i>Microscopy and Microanalysis</i> , 2008 , 14, 1350-1351	0.5	3
227	In Situ Raman Spectroscopy of SiO ₂ -Supported Transition Metal Oxide Catalysts: An Isotopic ¹⁸ O/ ¹⁶ O Exchange Study. <i>Journal of Physical Chemistry C</i> , 2008 , 112, 6487-6498	3.8	154
226	Influence of Vanadium Location in Titania Supported Vanadomolybdophosphoric Acid Catalysts and Its Effect on the Oxidation and Ammoxidation Functionalities. <i>Journal of Physical Chemistry C</i> , 2008 , 112, 8294-8300	3.8	29
225	Molecular Design and In Situ Spectroscopic Investigation of Multilayered Supported M ₁ O _x /M ₂ O _x /SiO ₂ Catalysts. <i>Journal of Physical Chemistry C</i> , 2008 , 112, 20418-20428	3.8	46
224	Probing Metal-Support Interactions under Oxidizing and Reducing Conditions: In Situ Raman and Infrared Spectroscopic and Scanning Transmission Electron Microscopic X-ray Energy-Dispersive Spectroscopic Investigation of Supported Platinum Catalysts. <i>Journal of Physical Chemistry C</i> , 2008 , 112, 5942-5951	3.8	93
223	An Operando Raman, IR, and TPSR Spectroscopic Investigation of the Selective Oxidation of Propylene to Acrolein over a Model Supported Vanadium Oxide Monolayer Catalyst. <i>Journal of Physical Chemistry C</i> , 2008 , 112, 11363-11372	3.8	51
222	Nature of Catalytic Active Sites for Sb ₂ WO ₆ Mixed Metal Oxides. <i>Journal of Physical Chemistry C</i> , 2008 , 112, 16858-16863	3.8	19
221	Study on the Reaction Mechanism for Soot Oxidation Over TiO ₂ or ZrO ₂ -supported Vanadium Oxide Catalysts by Means of In-situ UV-Raman. <i>Catalysis Letters</i> , 2008 , 120, 148-153	2.8	21
220	In-situ UV-Raman study on soot combustion over TiO ₂ or ZrO ₂ -supported vanadium oxide catalysts. <i>Science in China Series B: Chemistry</i> , 2008 , 51, 551-561		7
219	Photocatalytic Activity of Vanadium-Substituted ETS-10. <i>Journal of Physical Chemistry C</i> , 2007 , 111, 70293-7037	3.8	39

218	Structural characteristics and reactivity properties of the tantalum modified mesoporous silicalite (MCM-41) catalysts. <i>Microporous and Mesoporous Materials</i> , 2007 , 99, 299-307	5.3	14
217	Molecular/electronic structure-surface acidity relationships of model-supported tungsten oxide catalysts. <i>Journal of Catalysis</i> , 2007 , 246, 370-381	7.3	139
216	In Situ Spectroscopic Investigation of the Molecular and Electronic Structures of SiO ₂ Supported Surface Metal Oxides. <i>Journal of Physical Chemistry C</i> , 2007 , 111, 14410-14425	3.8	234
215	Structural Determination of Bulk and Surface Tungsten Oxides with UV-Vis Diffuse Reflectance Spectroscopy and Raman Spectroscopy. <i>Journal of Physical Chemistry C</i> , 2007 , 111, 15089-15099	3.8	285
214	Oxidative dehydrogenation of ethane to ethylene over alumina-supported vanadium oxide catalysts: Relationship between molecular structures and chemical reactivity. <i>Catalysis Today</i> , 2006 , 118, 279-287	5.3	148
213	Promotion of the propane ODH reaction over supported V ₂ O ₅ /Al ₂ O ₃ catalyst with secondary surface metal oxide additives. <i>Journal of Catalysis</i> , 2006 , 240, 151-159	7.3	47
212	Synthesis and characterization of NiMo bimetallic nitride from the mixture of nitrogen and hydrogen. <i>Materials Research Bulletin</i> , 2006 , 41, 2334-2340	5.1	7
211	Quantitative determination of the speciation of surface vanadium oxides and their catalytic activity. <i>Journal of Physical Chemistry B</i> , 2006 , 110, 9593-600	3.4	178
210	Catalysis science of the solid acidity of model supported tungsten oxide catalysts. <i>Catalysis Today</i> , 2006 , 116, 162-168	5.3	136
209	Selective oxidation of propylene to acrolein over supported V ₂ O ₅ /Nb ₂ O ₅ catalysts: An in situ Raman, IR, TPSR and kinetic study. <i>Catalysis Today</i> , 2006 , 118, 332-343	5.3	72
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