

Molybdenum Disulfide in the Poorly Crystalline "Rag" S

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Citation Report

#	ARTICLE	IF	CITATIONS
1	In situ studies of electrode reactions: The mechanism of lithium intercalation in TiS ₂ . Journal of Solid State Chemistry, 1979, 29, 323-337.	2.9	63
2	Structure and properties of molybdenum sulfide: Correlation of O ₂ chemisorption with hydrodesulfurization activity*1. Journal of Catalysis, 1980, 63, 515-519.	6.2	234
3	A Comparison of Hydrogen Sorption by Tungsten and Molybdenum Sulphides. Studies in Surface Science and Catalysis, 1981, , 1424-1425.	1.5	3
4	Friction properties of sputtered dichalcogenide layers. Tribology International, 1981, 14, 329-332.	5.9	45
5	In situ Mi β 1/2ssbauer emission spectroscopy studies of unsupported and supported sulfided Co β .sbn;Mo hydrodesulfurization catalysts: Evidence for and nature of a Co β .sbn;Mo β .sbn;S phase. Journal of Catalysis, 1981, 68, 433-452.	6.2	585
6	ESR studies on hydrodesulfurization catalysts: Nickel- or cobalt-promoted sulfided tungsten- or molybdenum-containing catalysts. Journal of Catalysis, 1981, 67, 145-158.	6.2	51
7	Lithium and sodium intercalated dichalcogenides: Properties and electrode applications. Synthetic Metals, 1982, 4, 225-248.	3.9	34
8	Amorphous and Poorly Crystalline Transition Metal Chalcogenides. International Reviews in Physical Chemistry, 1982, 2, 127-165.	2.3	57
9	Electron spin resonance of supported and unsupported molybdenum hydrotreating catalysts I. Model system studies. Journal of Catalysis, 1982, 78, 380-388.	6.2	44
10	Oxygen chemisorption on MoS ₂ and commercial hydrotreating catalysts. Journal of Catalysis, 1983, 84, 145-155.	6.2	56
11	Electron spin resonance of sulfide catalysts. Journal of Magnetism and Magnetic Materials, 1983, 31-34, 885-886.	2.3	5
12	Hrem and Aem studies of hds catalysts: Direct evidence for the edge location of cobalt in Co-Mo-Sa. Applied Catalysis, 1985, 13, 363-372.	0.8	55
13	High resolution electron microscopy of hydrodesulfurization catalysts: A review. Applied Catalysis, 1985, 16, 135-152.	0.8	95
14	Structure of poorly crystalline MoS ₂ â€” A modeling study. Journal of Non-Crystalline Solids, 1986, 79, 251-273.	3.1	168
15	Surface Disorder and Exfoliation in Lithographically Textured Molybdenum Disulfide. Materials Research Society Symposia Proceedings, 1986, 82, 481.	0.1	0
16	Catalysis by transition metal sulfides: A theoretical and experimental study of the relation between the synergic systems and the binary transition metal sulfides. Journal of Catalysis, 1986, 98, 17-31.	6.2	294
17	Single-layer MoS ₂ . Materials Research Bulletin, 1986, 21, 457-461.	5.2	1,195
18	Edge Surfaces in Lithographically Textured Molybdenum Disulfide. Science, 1987, 235, 1629-1631.	12.6	80

#	ARTICLE	IF	CITATIONS
19	Direct observation by controlled atmosphere electron microscopy of the changes in morphology of molybdenum oxide and sulfide supported on alumina and graphite. <i>Journal of Catalysis</i> , 1987, 105, 299-318.	6.2	59
20	Recent advances in catalysis over sulphides. <i>Catalysis Today</i> , 1988, 3, 269-365.	4.4	123
21	A new highly active hydrotreating catalyst prepared by the decomposition of thiotungstato-nickelate and characterized by high resolution electron microscopy. <i>Polyhedron</i> , 1988, 7, 2405-2409.	2.2	23
22	Structure/Function Relations in Transition Metal Sulfide Catalysts. <i>Studies in Surface Science and Catalysis</i> , 1989, 50, 1-19.	1.5	12
23	Hydrogenation and isomerization of alkadienes on powdered MoS _x H _y . <i>Journal of Catalysis</i> , 1989, 120, 108-117.	6.2	42
24	Growth of MoS ₂ and MoS ₂ : Co crystals using I ₂ as transport material. <i>Journal of Crystal Growth</i> , 1989, 96, 685-690.	1.5	8
25	Computer modelling of a molybdenum disulphide catalyst. <i>Polyhedron</i> , 1989, 8, 1814-1816.	2.2	6
26	Influence of Preparation on the Morphology and Microstructure of Cobalt-Molybdenum Sulphides. <i>Studies in Surface Science and Catalysis</i> , 1989, 50, 91-106.	1.5	2
27	A microstructural investigation of model solid state hydrodesulfurization catalysts. <i>Journal of Solid State Chemistry</i> , 1990, 87, 378-395.	2.9	9
28	Statistical mechanics of randomly polymerized membranes. <i>Physical Review A</i> , 1991, 44, 3525-3542.	2.5	62
29	Polymerized Membranes with Quenched Random Internal Disorder. <i>Europhysics Letters</i> , 1991, 16, 79-84.	2.0	48
30	Curvature disorder in tethered membranes: A new flat phase at T=0. <i>Physical Review A</i> , 1992, 46, 1751-1768.	2.5	32
31	Conformations of Crumpled Sheet Polymers. <i>Materials Research Society Symposia Proceedings</i> , 1992, 272, 301.	0.1	0
32	Crumpled and collapsed conformation in graphite oxide membranes. <i>Nature</i> , 1992, 355, 426-428.	27.8	160
33	Electrochemical studies of disordered MoS ₂ as cathode material in lithium batteries. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 1992, 15, 73-77.	3.5	45
34	Electrochemical properties and cycling performances of composite electrodes in solid state lithium batteries. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 1992, 14, 121-126.	3.5	17
35	Hydrodenitrogenation-selective catalysts I. Fe promoted Mo/W sulfides. <i>Journal of Catalysis</i> , 1992, 138, 351-363.	6.2	35
36	Room-temperature oxidation of K ₂ CO ₃ /MoS ₂ catalysts and its effects on alcohol synthesis from CO and H ₂ . <i>Journal of Catalysis</i> , 1992, 138, 525-535.	6.2	41

#	ARTICLE	IF	CITATIONS
37	Intercalation of Li into Single Crystals of MoS ₂ . Materials Research Society Symposia Proceedings, 1993, 327, 65.	0.1	0
38	Fundamental Studies of Transition-Metal Sulfide Catalytic Materials. Advances in Catalysis, 1994, 40, 177-232.	0.2	183
39	Conformations of a Tethered Membrane: Crumpling in Graphitic Oxide?. Physical Review Letters, 1994, 73, 2867-2870.	7.8	105
40	Synergy between the CoMoS Phase and Supported or Unsupported Cobalt Sulfide. Existence of a Remote Control Effect. Bulletin of the Chemical Society of Japan, 1995, 68, 107-119.	3.2	14
41	The effect of coal beneficiation and swelling on liquefaction behavior of Black Thunder coal. Fuel Processing Technology, 1995, 45, 53-67.	7.2	4
42	HREM studies of layered transition metal sulfide catalytic materials. Catalysis Today, 1995, 23, 269-281.	4.4	59
43	Catalytic hydrotreatment of Illinois No. 6 Coal-derived naphtha: Comparison of molybdenum nitride and molybdenum sulfide for heteroatom removal. Applied Catalysis A: General, 1995, 123, 229-250.	4.3	25
44	Electron microscopy of catalysts; the present, the future and the hopes. Catalysis Today, 1995, 23, 161-199.	4.4	44
45	Li intercalation across and along the van der Waals surfaces of MoS ₂ (0001). Surface Science, 1995, 338, 83-93.	1.9	138
46	Scaling Properties of Stretching Ridges in a Crumpled Elastic Sheet. Science, 1995, 270, 1482-1485.	12.6	284
47	Hydrotreating Catalysis. , 1996, , 1-269.		438
48	Molecular dynamics simulations of tethered membranes with periodic boundary conditions. Physical Review E, 1996, 53, 1422-1429.	2.1	17
49	STM Investigations of Confined Transition Metal Chalcogenide Colloidal Particles. Materials Research Society Symposia Proceedings, 1996, 464, 213.	0.1	1
50	Electrochemical properties of disordered cathode materials. Ionics, 1996, 2, 169-178.	2.4	23
51	Boundary layer analysis of the ridge singularity in a thin plate. Physical Review E, 1996, 53, 3750-3759.	2.1	117
52	Properties of ridges in elastic membranes. Physical Review E, 1997, 55, 1577-1589.	2.1	115
53	The flat phase of fixed-connectivity membranes. Nuclear Physics, Section B, Proceedings Supplements, 1997, 53, 746-752.	0.4	24
54	Second row transition metal sulfides for the hydrotreatment of coal-derived naphtha I. Catalyst preparation, characterization and comparison of rate of simultaneous removal of total sulfur, nitrogen and oxygen. Applied Catalysis A: General, 1997, 150, 297-318.	4.3	60

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55	Interactions of swelling solvents and catalyst precursors in coal liquefaction systems. Fuel Processing Technology, 1997, 51, 63-81.	7.2	6
56	Crystallite Size Determination of Highly Dispersed Unsupported MoS ₂ Catalysts. Journal of Catalysis, 1998, 174, 130-141.	6.2	105
57	Experimental Study of Developable Cones. Physical Review Letters, 1998, 80, 2354-2357.	7.8	76
58	Buckling Dynamics of Tethered Membranes. Materials Research Society Symposia Proceedings, 1998, 543, 169.	0.1	0
59	Crescent singularities and stress focusing in a buckled thin sheet: Mechanics of developable cones. Physical Review E, 1999, 60, 6091-6103.	2.1	25
60	Symmetrical synergism and the role of carbon in transition metal sulfide catalytic materials. Catalysis Today, 1999, 53, 357-366.	4.4	121
61	Tethered membranes far from equilibrium: Buckling dynamics. Physical Review E, 1999, 60, 4377-4384.	2.1	51
62	Buckling Dynamics of Compressed Thin Sheets (Membranes). Physical Review Letters, 1999, 82, 2884-2887.	7.8	44
63	Selective Hydrodesulfurization of FCC Naphtha with Supported MoS ₂ Catalysts: The Role of Cobalt. Journal of Catalysis, 2000, 193, 123-131.	6.2	78
64	Evolution of crystalline phases in nickel-tungsten sulfide catalysts. Materials Letters, 2000, 43, 1-5.	2.6	8
65	Aqueous Preparation of Highly Dispersed Molybdenum Sulfide. Inorganic Chemistry, 2000, 39, 5416-5417.	4.0	61
66	Intercalation compounds for advanced lithium batteries. , 2001, , 99-184.		12
67	Dynamics of the Euler Buckling Instability. Materials Research Society Symposia Proceedings, 2001, 672, 1.	0.1	0
68	The statistical mechanics of membranes. Physics Reports, 2001, 344, 255-308.	25.6	173
69	Hydrothermal Synthesis of MoS ₂ and Its Pressure-Related Crystallization. Journal of Solid State Chemistry, 2001, 159, 170-173.	2.9	136
70	Polymerized Membranes, a Review**The author has won the Physics Prize of the Academy of Science in Göttingen. Phase Transitions and Critical Phenomena, 2001, , 253-480.	1.2	12
71	Tube- and ball-like amorphous MoS ₂ prepared by a solvothermal method. Materials Chemistry and Physics, 2002, 73, 327-329.	4.0	47
72	Low temperature synthesis and characterization of molybdenum disulfide nanotubes and nanorods. Materials Chemistry and Physics, 2004, 87, 87-90.	4.0	110

#	ARTICLE	IF	CITATIONS
73	Simple solution route to uniform MoS ₂ particles with randomly stacked layers. Materials Research Bulletin, 2004, 39, 981-986.	5.2	25
74	Growth of molybdenum disulphide using iodine as transport material. Pramana - Journal of Physics, 2004, 63, 611-616.	1.8	14
75	Activation of tetraalkylammonium thiotungstates for the preparation of Ni-promoted WS ₂ catalysts. Applied Catalysis A: General, 2004, 266, 29-40.	4.3	30
76	Structural studies of catalytically stabilized model and industrial-supported hydrodesulfurization catalysts. Journal of Catalysis, 2004, 225, 288-299.	6.2	89
77	Inorganic nanotubes. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2004, 362, 2099-2125.	3.4	181
78	Nanotubes and Nanowires. , 2005, , 208-284.		33
80	A facile route to synthesis of MoS ₂ nanorods. Materials Letters, 2005, 59, 3452-3455.	2.6	59
81	Scaling behavior of tethered crumpled manifolds with inner dimension close to : Resumming the perturbation theory. Nuclear Physics B, 2005, 711, 530-564.	2.5	2
82	Cluster-Support Interactions and Morphology of MoS ₂ Nanoclusters in a Graphite-Supported Hydrotreating Model Catalyst. Journal of the American Chemical Society, 2006, 128, 13950-13958.	13.7	172
83	Inorganic nanotubes and fullerene-like nanoparticles. Journal of Materials Research, 2006, 21, 2726-2743.	2.6	69
84	Synthesis of Ni-Mo-W sulphide catalysts by ex situ decomposition of trimetallic precursors. Applied Catalysis A: General, 2006, 304, 124-130.	4.3	32
85	Synthesis and structural characterization of molybdenum sulfide tubulenes. Solar Energy Materials and Solar Cells, 2006, 90, 813-824.	6.2	7
86	Catalytic Properties of Single Layers of Transition Metal Sulfide Catalytic Materials. Catalysis Reviews - Science and Engineering, 2006, 48, 1-41.	12.9	270
87	Ni(Co)-Mo-W sulphide unsupported HDS catalysts by ex situ decomposition of alkylthiomolybdotungstates. Applied Catalysis A: General, 2006, 308, 134-142.	4.3	49
88	Single-Step Synthesis and Surface-Assisted Growth of Superconducting TaS ₂ Nanowires. Angewandte Chemie - International Edition, 2006, 45, 7060-7063.	13.8	30
89	Studies of Molybdenum Disulfide Nanostructures Prepared by AACVD Using Single-Source Precursors. Chemical Vapor Deposition, 2006, 12, 597-599.	1.3	35
91	Glassy Conformations in Wrinkled Membranes. Physical Review Letters, 2006, 96, 078101.	7.8	34
92	Inorganic Nanotubes and Fullerene-Like Structures (IF). Topics in Applied Physics, 2007, , 631-671.	0.8	47

#	ARTICLE	IF	CITATIONS
93	Synthesis and characterization of 1,2,3,4 tetrahydroquinoline intercalated into MoS ₂ in search of cleaner fuels. <i>Journal of Materials Research</i> , 2007, 22, 2747-2757.	2.6	4
94	Structure, dynamics, and phase transitions of tethered membranes: A Monte Carlo simulation study. <i>Journal of Chemical Physics</i> , 2007, 127, 194903.	3.0	11
95	WS ₂ Breeds with Carbon to Create a Wormlike Nanostructure and Assembly: Reaction of W(CO) ₆ with S under Autogenic Pressure at Elevated Temperature under Inert Atmosphere. <i>Journal of Physical Chemistry C</i> , 2007, 111, 134-140.	3.1	27
96	Syntheses and Characterizations of Bismuth Nanofilms and Nanorhombuses by the Structure-Controlling Solventless Method. <i>Inorganic Chemistry</i> , 2007, 46, 586-591.	4.0	49
98	Study on influence of catalysts on product distribution during liquefaction of Pakistani coal. <i>Energy Conversion and Management</i> , 2007, 48, 2502-2507.	9.2	12
99	Inorganic fullerenes and nanotubes: Wealth of materials and morphologies. <i>European Physical Journal: Special Topics</i> , 2007, 149, 71-101.	2.6	34
100	Regular hexagonal MoS ₂ microflakes grown from MoO ₃ precursor. <i>Applied Physics A: Materials Science and Processing</i> , 2007, 89, 783-788.	2.3	15
101	Synthesis, characterization and cyclohexene hydrogenation activity of high surface area molybdenum disulfide catalysts. <i>Catalysis Letters</i> , 2007, 113, 170-175.	2.6	18
102	Synthetic approaches to the molybdenum sulfide materials. <i>Comptes Rendus Chimie</i> , 2008, 11, 159-182.	0.5	105
103	Solution synthesis of the unsupported Ni-W sulfide hydrotreating catalysts. <i>Catalysis Today</i> , 2008, 130, 24-31.	4.4	48
104	Impact of preparation method and support modification on the activity of mesoporous hydrotreating CoMo catalysts. <i>Applied Catalysis A: General</i> , 2008, 348, 30-41.	4.3	23
105	Nanotubes in Minerals and Mineral-Related Systems. , 2008, , 179-191.		7
106	Hydrothermal synthesis of hollow MoS ₂ microspheres in ionic liquids/water binary emulsions. <i>Materials Letters</i> , 2008, 62, 3558-3560.	2.6	46
107	Adsorption of self-avoiding tethered membranes: A Monte Carlo simulation study. <i>Journal of Chemical Physics</i> , 2008, 129, 215103.	3.0	3
108	Pressure dependence electrical resistivity in DVT grown molybdenum dichalcogenides. <i>High Pressure Research</i> , 2008, 28, 133-140.	1.2	11
109	Atomic-Scale Structure of Mo ₆ S ₆ Nanowires. <i>Nano Letters</i> , 2008, 8, 3928-3931.	9.1	68
110	Numerical investigation of isolated crescent singularity. <i>Physical Review E</i> , 2008, 77, 056602.	2.1	3
111	Synthesis and Characterization of Hexamethylenediammonium Thiometallates as Precursors of MoS ₂ and WS ₂ Catalysts: In situ Activation During HDS of DBT. <i>Catalysis Letters</i> , 2009, 130, 318-326.	2.6	12

#	ARTICLE	IF	CITATIONS
112	Structure, Dynamic Properties, and Phase Transitions of Tethered Membranes. <i>Annals of the New York Academy of Sciences</i> , 2009, 1161, 397-406.	3.8	1
113	Topological crossovers in the forced folding of self-avoiding matter. <i>Physica A: Statistical Mechanics and Its Applications</i> , 2009, 388, 1780-1790.	2.6	14
114	Unsupported transition metal sulfide catalysts: 100 years of science and application. <i>Catalysis Today</i> , 2009, 147, 275-286.	4.4	206
115	Unsupported Ni-Mo-W sulphide HDS catalysts with the varying nickel concentration. <i>Applied Catalysis A: General</i> , 2009, 363, 45-51.	4.3	39
116	Controlled preparation of unsupported binary and ternary sulfides with high surface area from tetraalkylammonium thiosalts. <i>Journal of Physics and Chemistry of Solids</i> , 2010, 71, 642-646.	4.0	11
117	Surfactant-assisted fabrication of MoS ₂ nanospheres. <i>Journal of Materials Science</i> , 2010, 45, 182-187.	3.7	47
118	Synthesis of WS ₂ nanosheets by a novel mechanical activation method. <i>Materials Letters</i> , 2010, 64, 856-858.	2.6	37
119	On the Role of Promoter Atoms in Unsupported Hydrodesulfurization Catalysts: Influence of Preparation Methods. <i>Bulletin Des Sociétés Chimiques Belges</i> , 1981, 90, 1225-1232.	0.0	85
120	Deep Hydroconversion of Heavy Oil Residues with Dispersed Catalysts: Analysis of the Transformation. <i>Bulletin Des Sociétés Chimiques Belges</i> , 1995, 104, 359-366.	0.0	7
122	Mismatch Strain versus Dangling Bonds: Formation of α -Coil Nanowires by Stacking Nanosheets. <i>Angewandte Chemie - International Edition</i> , 2010, 49, 3301-3305.	13.8	14
123	Preparation of MoS ₂ nanoflakes by a novel mechanical activation method. <i>Journal of Crystal Growth</i> , 2010, 312, 340-343.	1.5	39
124	Study of induction period over K ₂ CO ₃ /MoS ₂ catalyst for higher alcohols synthesis. <i>Fuel Processing Technology</i> , 2010, 91, 383-387.	7.2	37
125	Superconducting tantalum disulfide nanotapes; growth, structure and stoichiometry. <i>Nanoscale</i> , 2010, 2, 90-97.	5.6	18
127	Synthesis of MoS ₂ Nanosheets by Solid-State Reaction in CVD Furnace. <i>Integrated Ferroelectrics</i> , 2011, 128, 125-129.	0.7	8
128	Chapter 2. Inorganic Nanotubes. <i>RSC Nanoscience and Nanotechnology</i> , 2011, , 243-342.	0.2	0
129	Nanocrystalline MoS ₂ through directional growth along the (0 0 2) crystal plane under high pressure. <i>Materials Chemistry and Physics</i> , 2011, 130, 170-174.	4.0	15
130	A novel route for the synthesis of nanotubes and fullerene-like nanostructures of molybdenum disulfide. <i>Materials Research Bulletin</i> , 2011, 46, 2240-2246.	5.2	20
131	Preparation of unsupported Ni-Mo-S catalysts for hydrodesulfurization of dibenzothiophene by thermal decomposition of tetramethylammonium thiomolybdates. <i>Catalysis Today</i> , 2011, 175, 460-466.	4.4	34

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132	The Effect of CO Pretreatment on Fe/ADM Catalyst for Higher Alcohols Synthesis from Syngas. <i>Advanced Materials Research</i> , 0, 347-353, 3772-3776.	0.3	0
133	Shapes of hydrophobic thick membranes. <i>Europhysics Letters</i> , 2012, 98, 56006.	2.0	0
134	HRTEM and molecular modeling of the MoS ₂ /Co ₉ S ₈ interface: understanding the promotion effect in bulk HDS catalysts. <i>Catalysis Science and Technology</i> , 2012, 2, 164-178.	4.1	143
135	Unsupported MoS ₂ and CoMoS ₂ catalysts for hydrodeoxygenation of phenol. <i>Chemical Engineering Science</i> , 2012, 79, 1-7.	3.8	115
136	Synthesis of MoS ₂ /C Submicrosphere by PVP-Assisted Hydrothermal Method for Lithium Ion Battery. <i>Advanced Materials Research</i> , 0, 531, 471-477.	0.3	5
137	"Ship-in-a-Bottle"™ Synthesis of MoS ₂ /MCM-41 Catalysts by Decomposition of Single Source Precursor in Mesoporous Channel. <i>Catalysis Letters</i> , 2012, 142, 854-859.	2.6	0
138	Curved nanostructures of unsupported and Al ₂ O ₃ -supported MoS ₂ catalysts: Synthesis and HDS catalytic properties. <i>Applied Catalysis A: General</i> , 2012, 429-430, 92-105.	4.3	58
139	Surfactant-assisted hydrothermal synthesis and tribological properties of flower-like MoS ₂ nanostructures. <i>Micro and Nano Letters</i> , 2013, 8, 164-168.	1.3	28
140	Effect of sulfidation temperature on the catalytic activity of MoO ₃ /CeO ₂ /Al ₂ O ₃ toward sulfur-resistant methanation. <i>Applied Catalysis A: General</i> , 2013, 466, 224-232.	4.3	31
141	Aqueous Medium Synthesis Route for Randomly Stacked Molybdenum Disulfide. <i>Journal of Nanoparticles</i> , 2013, 2013, 1-10.	1.4	27
142	Catalysts for Hydrogenations, Dehydrogenations and Metathesis. , 2014, , 345-374.		6
143	CoMoW sulfide nanocatalysts for the HDS of DBT from novel ammonium and alkyltrimethylammonium-thiomolybdate-thiotungstate-cobaltate (II) precursors. <i>Applied Catalysis A: General</i> , 2014, 486, 62-68.	4.3	18
144	Nanoscale Transition Metal Dichalcogenides: Structures, Properties, and Applications. <i>Critical Reviews in Solid State and Materials Sciences</i> , 2014, 39, 319-367.	12.3	125
145	Rippling and crumpling in disordered free-standing graphene. <i>Physical Review B</i> , 2015, 92, .	3.2	36
146	Facile synthesis and electrochemical properties of MoS ₂ nanostructures with different lithium storage properties. <i>RSC Advances</i> , 2015, 5, 48492-48499.	3.6	21
147	Unsupported trimetallic CoMoW sulfide HDS catalysts prepared by in situ decomposition of sulfur-containing precursors. <i>Catalysis Today</i> , 2015, 250, 28-37.	4.4	20
148	A facile and low-cost synthesis of MoS ₂ for hydrodeoxygenation of phenol. <i>Catalysis Communications</i> , 2015, 68, 31-35.	3.3	47
149	Hydrothermal synthesis and characterization of 3D flower-like MoS ₂ microspheres. <i>Materials Letters</i> , 2015, 148, 67-70.	2.6	123

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150	A New Molybdenum Nitride Catalyst with Rhombohedral MoS ₂ Structure for Hydrogenation Applications. <i>Journal of the American Chemical Society</i> , 2015, 137, 4815-4822.	13.7	195
151	In Situ Formation of a MoS ₂ -Based Inorganic-Organic Nanocomposite by Directed Thermal Decomposition. <i>Chemistry - A European Journal</i> , 2015, 21, 8918-8925.	3.3	7
152	Graphene-MoS ₂ composite: Hydrothermal synthesis and catalytic property in hydrodesulfurization of dibenzothiophene. <i>Catalysis Communications</i> , 2015, 72, 180-184.	3.3	25
153	MoS ₂ catalysts derived from n-methylenediammonium thiomolybdates during HDS of DBT. <i>Catalysis Today</i> , 2015, 250, 66-71.	4.4	7
154	Protein-induced ultrathin molybdenum disulfide (MoS ₂) flakes for a water-based lubricating system. <i>RSC Advances</i> , 2016, 6, 113315-113321.	3.6	26
155	Colloidal Synthesis of Uniform-Sized Molybdenum Disulfide Nanosheets for Wafer-Scale Flexible Nonvolatile Memory. <i>Advanced Materials</i> , 2016, 28, 9326-9332.	21.0	151
156	Metal Sulfides: Novel Synthesis Methods and Recent Developments. , 2016, , 313-360.		9
157	Facile synthesis of Mo _{0.91} W _{0.09} S ₂ ultrathin nanosheets/amorphous carbon composites for lithium-ion battery anode. <i>Ceramics International</i> , 2016, 42, 7803-7809.	4.8	11
158	Trimetallic NiMoW sulfide catalysts by the thermal decomposition of thiosalt blends for the hydrodesulfurization of dibenzothiophene. <i>Reaction Kinetics, Mechanisms and Catalysis</i> , 2017, 121, 593-605.	1.7	12
159	Acceptorless Dehydrogenative Coupling of Neat Alcohols Using Group VI Sulfide Catalysts. <i>ACS Sustainable Chemistry and Engineering</i> , 2017, 5, 4890-4896.	6.7	16
160	Deoxygenation of palm kernel oil to jet fuel-like hydrocarbons using Ni-MoS ₂ /Al ₂ O ₃ catalysts. <i>Energy Conversion and Management</i> , 2017, 134, 188-196.	9.2	82
161	Inorganic Nanotubes and Fullerene-like Nanoparticles at the Crossroads between Solid-State Chemistry and Nanotechnology. <i>Journal of the American Chemical Society</i> , 2017, 139, 12865-12878.	13.7	52
162	A Novel Flakes-Like Structure of Molybdenum Disulphide Modified Glassy Carbon Electrode for the Efficient Electrochemical Detection of Dopamine. <i>International Journal of Electrochemical Science</i> , 2017, 12, 9288-9300.	1.3	17
163	Effects of Pressure and Temperature in Hydrothermal Preparation of MoS ₂ Catalyst for Methanation Reaction. <i>Catalysis Letters</i> , 2018, 148, 1803-1814.	2.6	15
164	High-temperature solvent-free sulfidation of MoO ₃ confined in a polypyrrole shell: MoS ₂ nanosheets encapsulated in a nitrogen, sulfur dual-doped carbon nanoprism for efficient lithium storage. <i>Nanoscale</i> , 2018, 10, 7536-7543.	5.6	35
165	Anomalous elasticity, fluctuations and disorder in elastic membranes. <i>Annals of Physics</i> , 2018, 392, 340-410.	2.8	73
166	The particular characteristics of the active sites of MoS ₂ , WS ₂ catalysts in thiophene hydrodesulfurization. <i>Reaction Kinetics, Mechanisms and Catalysis</i> , 2018, 124, 61-74.	1.7	6
167	Application of Uniform Design Method in the Optimization of Hydrothermal Synthesis for Nano MoS ₂ Catalyst with High HDS Activity. <i>Catalysts</i> , 2018, 8, 654.	3.5	8

#	ARTICLE	IF	CITATIONS
168	Using light, X-rays and electrons for evaluation of the nanostructure of layered materials. <i>Nanoscale</i> , 2018, 10, 21142-21150.	5.6	15
169	Structure and Dynamics of a Graphene Melt. <i>ACS Nano</i> , 2018, 12, 5427-5435.	14.6	29
170	Gas phase acceptorless dehydrogenative coupling of ethanol over bulk MoS ₂ and spectroscopic measurement of structural disorder. <i>Journal of Catalysis</i> , 2018, 366, 159-166.	6.2	12
171	Enhanced sulfur-resistant methanation performance over MoO ₃ –ZrO ₂ catalyst prepared by solution combustion method. <i>Applied Organometallic Chemistry</i> , 2019, 33, e5022.	3.5	3
172	Impact of the MoS ₂ Starting Material on the Dispersion Quality and Quantity after Liquid Phase Exfoliation. <i>Chemistry of Materials</i> , 2019, 31, 8424-8431.	6.7	23
173	Nanostructured tungsten sulfides: insights into precursor decomposition and the microstructure using X-ray scattering methods. <i>Dalton Transactions</i> , 2019, 48, 1184-1201.	3.3	19
174	Hydrothermal synthesis of two-dimensional MoS ₂ and its applications. <i>Tungsten</i> , 2019, 1, 59-79.	4.8	45
175	The unexpected effect of vacancies and wrinkling on the electronic properties of MoS ₂ layers. <i>Physical Chemistry Chemical Physics</i> , 2019, 21, 24731-24739.	2.8	5
176	Size-controlled MoS ₂ nanosheet through ball milling exfoliation: parameter optimization, structural characterization and electrocatalytic application. <i>Nanotechnology</i> , 2020, 31, 075704.	2.6	24
177	Morphology, microstructure, coordinative unsaturation, and hydrogenation activity of unsupported MoS ₂ : How idealized models fail to describe a real sulfide material. <i>Applied Catalysis B: Environmental</i> , 2020, 266, 118623.	20.2	10
178	Cobalt-promoted MoS ₂ nanosheets: A promising novel diesel hydrodesulfurization catalyst. <i>International Journal of Chemical Kinetics</i> , 2020, 52, 159-166.	1.6	8
179	Isobutane Dehydrogenation over Bulk and Supported Molybdenum Sulfide Catalysts. <i>Industrial & Engineering Chemistry Research</i> , 2020, 59, 1113-1122.	3.7	18
180	Metal telluride nanotubes: Synthesis, and applications. <i>Materials Chemistry and Physics</i> , 2020, 256, 123691.	4.0	16
181	Lithium Batteries: 50 Years of Advances to Address the Next 20 Years of Climate Issues. <i>Nano Letters</i> , 2020, 20, 8435-8437.	9.1	89
182	Unsupported Co _{Ni} Mo sulfide hydrodesulfurization catalysts prepared by the thermal decomposition of trimetallic tetrabutylammonium thiomolybdate: effect of nickel on sulfur removal. <i>Reaction Kinetics, Mechanisms and Catalysis</i> , 2020, 131, 187-198.	1.7	6
183	MoS ₂ nanostructured materials for electrode modification in the development of a laccase based amperometric biosensor for non-invasive dopamine detection. <i>Microchemical Journal</i> , 2020, 155, 104792.	4.5	32
184	Effect of Lanthanum Doping on the reactivity of unsupported CoMoS ₂ catalysts. <i>Applied Catalysis A: General</i> , 2021, 611, 117891.	4.3	5
185	Critical review: hydrothermal synthesis of 1T-MoS ₂ – an important route to a promising material. <i>Journal of Materials Chemistry A</i> , 2021, 9, 9451-9461.	10.3	37

#	ARTICLE	IF	CITATIONS
186	Inorganic nanotubes for water treatment through adsorption and photocatalytic degradation. , 2021, , 417-429.		0
187	Exciting Opportunities for Solid-State ⁹⁵ Mo NMR Studies of MoS ₂ Nanostructures in Materials Research from a Low to an Ultrahigh Magnetic Field (35.2 T). Journal of Physical Chemistry C, 2021, 125, 7824-7838.	3.1	1
188	Hydrodesulfurization of dibenzothiophene using novel unsupported FeMoS catalysts prepared by in-situ activation from Fe (III)-containing thiomolybdate salts. Reaction Kinetics, Mechanisms and Catalysis, 2021, 133, 1027-1044.	1.7	3
189	Microscopic and atomistic mechanisms of sliding friction of MoS ₂ : Effects of undissociated and dissociated H ₂ O. Applied Surface Science, 2021, 563, 150270.	6.1	18
190	Materials for electrodes: Amorphous and thin-films. Kluwer International Series in Engineering and Computer Science, 1994, , 513-578.	0.2	3
191	Compound Crystals. , 2013, , 605-638.		2
192	CrI ₃ magnetic nanotubes: A comparative DFT and DFT+U study, and strain effect. Physica E: Low-Dimensional Systems and Nanostructures, 2020, 123, 114205.	2.7	12
193	Inorganic Nanotubes and Fullerene-Like Materials of Metal Dichalcogenide and Related Layered Compounds. Advanced Materials and Technologies, 2006, , 135-155.	0.4	2
194	Morphology and Catalytic Performance of MoS ₂ Hydrothermally Synthesized at Various pH Values. Catalysts, 2021, 11, 1229.	3.5	12
195	Inorganic Nanotubes and Fullerene- Like Materials of Metal Dichalcogenide and Related Layered Compounds. , 2006, , .		2
197	Cycling performances of composite electrodes in solid state lithium batteries. , 1992, , 69-75.		0
198	Properties of disordered MoS ₂ as cathode material in lithium electrochemical cells. , 1992, , 49-54.		0
199	Materials for Electrodes: Crystalline Compounds. Kluwer International Series in Engineering and Computer Science, 1994, , 369-511.	0.2	0
200	An Overview of Surface Analysis. Application to the Adsorption of Li on Single Crystals of Layered Compounds. , 1995, , 115-131.		0
201	Two-step hydrothermal preparation of poor crystalline MoS ₂ and its enhanced performance for dibenzothiophene hydrodesulphurisation. Micro and Nano Letters, 2020, 15, 662-665.	1.3	1
202	CHAPTER 4. Inorganic Nanotubes. RSC Nanoscience and Nanotechnology, 2021, , 240-356.	0.2	0
203	Synthesis of the Elusive Doublewall Nanotubes and Nanocones(Horns) of MoS ₂ via Focused Solar Ablation. Advanced Materials Interfaces, 2023, 10, .	3.7	2
204	A Metal-Organic Frameworks Derived 1T-MoS ₂ with Expanded Layer Spacing for Enhanced Electrocatalytic Hydrogen Evolution. Small, 2023, 19, .	10.0	15

#	ARTICLE	IF	CITATIONS
205	Sustainable synthesis of SiS ₂ for solid-state electrolytes by cascaded metathesis. <i>Materials Today Communications</i> , 2023, 35, 105574.	1.9	4
206	The Dynamic Interaction of Surfactants with Colloidal Molybdenum Disulfide Nanosheets Calls for Thermodynamic Stabilization by Solvents. <i>Langmuir</i> , 2023, 39, 6568-6579.	3.5	0
207	Composites of transition metal dichalcogenides and topological insulators as catalytic materials for HER. <i>Journal of Energy Storage</i> , 2023, 68, 107719.	8.1	2
208	A bibliometric analysis of molybdenum-based nanomaterials in the biomedical field. <i>Tungsten</i> , 2024, 6, 17-47.	4.8	2
209	Modulating Crystallization of MoS ₂ Nanostructures by Dimethyl Sulfoxide for Enhanced Hydrodesulfurization. <i>ACS Applied Nano Materials</i> , 2023, 6, 21752-21762.	5.0	0
210	Temperature-Dependent Frictional Behavior of MoS ₂ in Humid Environments: Insights from Water Molecule Adsorption and DFT Analyses. <i>ACS Applied Materials & Interfaces</i> , 2024, 16, 13267-13281.	8.0	0
211	Superlubricity via operando formation of MoS ₂ /S ₈ heterojunctions on steel surface with amorphous carbon protection. <i>Nano Energy</i> , 2024, 123, 109404.	16.0	0