Zdenek Sofer

List of Publications by Year
in descending order

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Version: 2024-02-01

529 papers	24,550 citations	6592 79 h-index	14156 128 g-index
551 all docs	551 docs citations	551 times ranked	25048 citing authors

#	Article	IF	Citations
1	2D Monoelemental Arsenene, Antimonene, and Bismuthene: Beyond Black Phosphorus. Advanced Materials, 2017, 29, 1605299.	11.1	601
2	2H â† 1T phase transition and hydrogen evolution activity of MoS₂, MoSe₂, WS₂ and WSe₂ strongly depends on the MX₂ composition. Chemical Communications, 2015, 51, 8450-8453.	2.2	565
3	Layered transition metal dichalcogenides for electrochemical energy generation and storage. Journal of Materials Chemistry A, 2014, 2, 8981-8987.	5.2	552
4	Black Phosphorus Rediscovered: From Bulk Material to Monolayers. Angewandte Chemie - International Edition, 2017, 56, 8052-8072.	7.2	407
5	Graphenes prepared by Staudenmaier, Hofmann and Hummers methods with consequent thermal exfoliation exhibit very different electrochemical properties. Nanoscale, 2012, 4, 3515.	2.8	363
6	Cytotoxicity of Exfoliated Transitionâ€Metal Dichalcogenides (MoS₂, WS₂, and) Tj ETQq0 0 0 rgBT /Overlock 2014, 20, 9627-9632.	1.7	358
7	Sulfur-Doped Graphene via Thermal Exfoliation of Graphite Oxide in H₂S, SO₂, or CS₂ Gas. ACS Nano, 2013, 7, 5262-5272.	7.3	321
8	Layered and two dimensional metal oxides for electrochemical energy conversion. Energy and Environmental Science, 2019, 12, 41-58.	15.6	310
9	Electrochemistry at Chemically Modified Graphenes. Chemistry - A European Journal, 2011, 17, 10763-10770.	1.7	288
10	Electrochemistry of Transition Metal Dichalcogenides: Strong Dependence on the Metal-to-Chalcogen Composition and Exfoliation Method. ACS Nano, 2014, 8, 12185-12198.	7.3	288
11	Carboxylic Carbon Quantum Dots as a Fluorescent Sensing Platform for DNA Detection. ACS Applied Materials & Interfaces, 2016, 8, 1951-1957.	4.0	261
12	Lithium Intercalation Compound Dramatically Influences the Electrochemical Properties of Exfoliated MoS₂. Small, 2015, 11, 605-612.	5.2	250
13	Synthesis of Strongly Fluorescent Graphene Quantum Dots by Cage-Opening Buckminsterfullerene. ACS Nano, 2015, 9, 2548-2555.	7.3	248
14	Layered Platinum Dichalcogenides (PtS₂, PtSe₂, and PtTe₂) Electrocatalysis: Monotonic Dependence on the Chalcogen Size. Advanced Functional Materials, 2016, 26, 4306-4318.	7.8	228
15	Electrochemical Exfoliation of Layered Black Phosphorus into Phosphorene. Angewandte Chemie - International Edition, 2017, 56, 10443-10445.	7.2	228
16	Electrocatalysis of layered Group 5 metallic transition metal dichalcogenides (MX₂, M =) Tj ETQq0 0 0 rgBT /Overlock 10 Tf	5.2	218
17	Pnictogen (As, Sb, Bi) Nanosheets for Electrochemical Applications Are Produced by Shear Exfoliation Using Kitchen Blenders. Angewandte Chemie - International Edition, 2017, 56, 14417-14422.	7.2	216
18	Noble metal (Pd, Ru, Rh, Pt, Au, Ag) doped graphene hybrids for electrocatalysis. Nanoscale, 2012, 4, 5002.	2.8	214

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19	3D-Printed Graphene/Polylactic Acid Electrodes Promise High Sensitivity in Electroanalysis. Analytical Chemistry, 2018, 90, 5753-5757.	3.2	205
20	Doping with Graphitic Nitrogen Triggers Ferromagnetism in Graphene. Journal of the American Chemical Society, 2017, 139, 3171-3180.	6.6	202
21	Chemically reduced graphene contains inherent metallic impurities present in parent natural and synthetic graphite. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 12899-12904.	3.3	195
22	Graphene oxide immobilized enzymes show high thermal and solvent stability. Nanoscale, 2015, 7, 5852-5858.	2.8	195
23	3D Printed Graphene Electrodesâ€™ Electrochemical Activation. ACS Applied Materials & Interfaces, 2018, 10, 40294-40301.	4.0	188
24	Layered Black Phosphorus as a Selective Vapor Sensor. Angewandte Chemie - International Edition, 2015, 54, 14317-14320.	7.2	187
25	Catalytic and Charge Transfer Properties of Transition Metal Dichalcogenides Arising from Electrochemical Pretreatment. ACS Nano, 2015, 9, 5164-5179.	7.3	184
26	3R phase of MoS₂ and WS₂ outperforms the corresponding 2H phase for hydrogen evolution. Chemical Communications, 2017, 53, 3054-3057.	2.2	180
27	Layered Metal Thiophosphite Materials: Magnetic, Electrochemical, and Electronic Properties. ACS Applied Materials & Interfaces, 2017, 9, 12563-12573.	4.0	179
28	Negative Electrocatalytic Effects of p-Doping Niobium and Tantalum on MoS₂ and WS₂ for the Hydrogen Evolution Reaction and Oxygen Reduction Reaction. ACS Catalysis, 2016, 6, 5724-5734.	5.5	174
29	The Cytotoxicity of Layered Black Phosphorus. Chemistry - A European Journal, 2015, 21, 13991-13995.	1.7	173
30	Metallic Impurities in Graphenes Prepared from Graphite Can Dramatically Influence Their Properties. Angewandte Chemie - International Edition, 2012, 51, 500-503.	7.2	164
31	MoS₂ exhibits stronger toxicity with increased exfoliation. Nanoscale, 2014, 6, 14412-14418.	2.8	162
32	The Covalent Functionalization of Layered Black Phosphorus by Nucleophilic Reagents. Angewandte Chemie - International Edition, 2017, 56, 9891-9896.	7.2	159
33	Will Any Crap We Put into Graphene Increase Its Electrocatalytic Effect?. ACS Nano, 2020, 14, 21-25.	7.3	158
34	Graphite Oxides: Effects of Permanganate and Chlorate Oxidants on the Oxygen Composition. Chemistry - A European Journal, 2012, 18, 13453-13459.	1.7	156
35	MXene Titanium Carbide-based Biosensor: Strong Dependence of Exfoliation Method on Performance. Analytical Chemistry, 2020, 92, 2452-2459.	3.2	155
36	Tuning of fluorine content in graphene: towards large-scale production of stoichiometric fluorographene. Nanoscale, 2015, 7, 13646-13655.	2.8	153

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37	Searching for Magnetism in Hydrogenated Graphene: Using Highly Hydrogenated Graphene Prepared via Birch Reduction of Graphite Oxides. ACS Nano, 2013, 7, 5930-5939.	7.3	149
38	Halogenation of Graphene with Chlorine, Bromine, or Iodine by Exfoliation in a Halogen Atmosphere. Chemistry - A European Journal, 2013, 19, 2655-2662.	1.7	143
39	Black Phosphorus Nanoparticle Labels for Immunoassays via Hydrogen Evolution Reaction Mediation. Analytical Chemistry, 2016, 88, 10074-10079.	3.2	142
40	Layered Black Phosphorus: Strongly Anisotropic Magnetic, Electronic, and Electronâ€Transfer Properties. Angewandte Chemie - International Edition, 2016, 55, 3382-3386.	7.2	139
41	1T-Phase Transition Metal Dichalcogenides (MoS₂, MoSe₂, WS₂,) Tj ETQq1 1 0.784314 rgBT /O Enzyme-Based Biosensor. ACS Applied Materials & Interfaces, 2017, 9, 40697-40706.	4.0	138
42	Synthetic routes contaminate graphene materials with a whole spectrum of unanticipated metallic elements. Proceedings of the National Academy of Sciences of the United States of America, 2014, 111, 13774-13779.	3.3	133
43	Pristine Basalâ€and Edgeâ€Planeâ€Oriented Molybdenite MoS₂ Exhibiting Highly Anisotropic Properties. Chemistry - A European Journal, 2015, 21, 7170-7178.	1.7	133
44	Transition metal dichalcogenides (MoS2, MoSe2, WS2 and WSe2) exfoliation technique has strong influence upon their capacitance. Electrochemistry Communications, 2015, 56, 24-28.	2.3	129
45	Equipartition of Energy Defines the Sizeâ€“Thickness Relationship in Liquid-Exfoliated Nanosheets. ACS Nano, 2019, 13, 7050-7061.	7.3	123
46	Metallic 1Tâ€WS₂ for Selective Impedimetric Vapor Sensing. Advanced Functional Materials, 2015, 25, 5611-5616.	7.8	122
47	Synthesis and Applications of Graphene Oxide. Materials, 2022, 15, 920.	1.3	121
48	Few-layer black phosphorus nanoparticles. Chemical Communications, 2016, 52, 1563-1566.	2.2	120
49	Inherently Electroactive Graphene Oxide Nanoplatelets As Labels for Single Nucleotide Polymorphism Detection. ACS Nano, 2012, 6, 8546-8551.	7.3	113
50	Towards graphene bromide: bromination of graphite oxide. Nanoscale, 2014, 6, 6065-6074.	2.8	109
51	Two-Dimensional 1T-Phase Transition Metal Dichalcogenides as Nanocarriers To Enhance and Stabilize Enzyme Activity for Electrochemical Pesticide Detection. ACS Nano, 2017, 11, 5774-5784.	7.3	109
52	Boron-Doped Graphene: Scalable and Tunable p-Type Carrier Concentration Doping. Journal of Physical Chemistry C, 2013, 117, 23251-23257.	1.5	108
53	Recent Developments on the Single Atom Supported at 2D Materials Beyond Graphene as Catalysts. ACS Catalysis, 2020, 10, 9634-9648.	5.5	102
54	Chemistry of Graphene Derivatives: Synthesis, Applications, and Perspectives. Chemistry - A European Journal, 2018, 24, 5992-6006.	1.7	99

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55	Catalytic properties of group 4 transition metal dichalcogenides (MX₂; M = Ti, Zr, Hf; X =) Tj ETQq1 1 0.784314 rgBT /Over	5.2	98
56	Voltammetry of Layered Black Phosphorus: Electrochemistry of Multilayer Phosphorene. ChemElectroChem, 2015, 2, 324-327.	1.7	97
57	Exfoliation of Layered Topological Insulators Bi₂Se₃ and Bi₂Te₃ via Electrochemistry. ACS Nano, 2016, 10, 11442-11448.	7.3	97
58	Graphene materials preparation methods have dramatic influence upon their capacitance. Electrochemistry Communications, 2012, 14, 5-8.	2.3	96
59	The capacitance and electron transfer of 3D-printed graphene electrodes are dramatically influenced by the type of solvent used for pre-treatment. Electrochemistry Communications, 2019, 102, 83-88.	2.3	96
60	Pnictogenâ€Based Enzymatic Phenol Biosensors: Phosphorene, Arsenene, Antimonene, and Bismuthene. Angewandte Chemie - International Edition, 2019, 58, 134-138.	7.2	96
61	The chemistry of CVD graphene. Journal of Materials Chemistry C, 2018, 6, 6082-6101.	2.7	95
62	Sulfur Doping Induces Strong Ferromagnetic Ordering in Graphene: Effect of Concentration and Substitution Mechanism. Advanced Materials, 2016, 28, 5045-5053.	11.1	94
63	Beyond Graphene: Chemistry of Group 14 Graphene Analogues: Silicene, Germanene, and Stanene. ACS Nano, 2019, 13, 8566-8576.	7.3	93
64	Ultrapure Graphene Is a Poor Electrocatalyst: Definitive Proof of the Key Role of Metallic Impurities in Graphene-Based Electrocatalysis. ACS Nano, 2019, 13, 1574-1582.	7.3	92
65	Radioactive Uranium Preconcentration via Self-Propelled Autonomous Microrobots Based on Metalâ€“Organic Frameworks. ACS Nano, 2019, 13, 11477-11487.	7.3	90
66	Lithium Exfoliated Vanadium Dichalcogenides (VS₂, VSe₂, VTe₂) Exhibit Dramatically Different Properties from Their Bulk Counterparts. Advanced Materials Interfaces, 2016, 3, 1600433.	1.9	89
67	Synthesis procedure and type of graphite oxide strongly influence resulting graphene properties. Applied Materials Today, 2016, 4, 45-53.	2.3	87
68	Tuning of graphene oxide composition by multiple oxidations for carbon dioxide storage and capture of toxic metals. Journal of Materials Chemistry A, 2017, 5, 2739-2748.	5.2	87
69	Pnictogen (As, Sb, Bi) Nanosheets for Electrochemical Applications Are Produced by Shear Exfoliation Using Kitchen Blenders. Angewandte Chemie, 2017, 129, 14609-14614.	1.6	87
70	Unusual Inherent Electrochemistry of Graphene Oxides Prepared Using Permanganate Oxidants. Chemistry - A European Journal, 2013, 19, 12673-12683.	1.7	86
71	Layered SnS versus SnS₂: Valence and Structural Implications on Electrochemistry and Clean Energy Electrocatalysis. Journal of Physical Chemistry C, 2016, 120, 24098-24111.	1.5	85
72	Black Phosphorus Nanoflakes/Polyaniline Hybrid Material for High-Performance Pseudocapacitors. Journal of Physical Chemistry C, 2017, 121, 20532-20538.	1.5	85

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73	Metal-Free Visible-Light Photoactivated C₃N₄ Bubble-Propelled Tubular Micromotors with Inherent Fluorescence and On/Off Capabilities. ACS Nano, 2018, 12, 12482-12491.	7.3	85
74	Exfoliated Layered Manganese Trichalcogenide Phosphite (MnPX₃, X = S, Se) as Electrocatalytic van der Waals Materials for Hydrogen Evolution. Advanced Functional Materials, 2019, 29, 1805975.	7.8	85
75	Proteinase-sculptured 3D-printed graphene/polylactic acid electrodes as potential biosensing platforms: towards enzymatic modeling of 3D-printed structures. Nanoscale, 2019, 11, 12124-12131.	2.8	84
76	Towards stoichiometric analogues of graphene: graphane, fluorographene, graphol, graphene acid and others. Chemical Society Reviews, 2017, 46, 4450-4463.	18.7	83
77	The Role of the Metal Element in Layered Metal Phosphorus Triselenides upon Their Electrochemical Sensing and Energy Applications. ACS Catalysis, 2017, 7, 8159-8170.	5.5	83
78	Electrodeposited NiSe on a forest of carbon nanotubes as a free-standing electrode for hybrid supercapacitors and overall water splitting. Journal of Colloid and Interface Science, 2020, 574, 300-311.	5.0	83
79	Black phosphorus nanoparticles as a novel fluorescent sensing platform for nucleic acid detection. Materials Chemistry Frontiers, 2017, 1, 1130-1136.	3.2	82
80	Cooperative Multifunctional Selfâ€Propelled Paramagnetic Microrobots with Chemical Handles for Cell Manipulation and Drug Delivery. Advanced Functional Materials, 2018, 28, 1804343.	7.8	81
81	Solutionâ€Processed GaSe Nanoflakeâ€Based Films for Photoelectrochemical Water Splitting and Photoelectrochemicalâ€Type Photodetectors. Advanced Functional Materials, 2020, 30, 1909572.	7.8	81
82	Layered transition metal oxyhydroxides as tri-functional electrocatalysts. Journal of Materials Chemistry A, 2015, 3, 11920-11929.	5.2	80
83	Aromatic-Exfoliated Transition Metal Dichalcogenides: Implications for Inherent Electrochemistry and Hydrogen Evolution. ACS Catalysis, 2016, 6, 4594-4607.	5.5	80
84	Atomically Thin 2Dâ€Arsenene by Liquidâ€Phased Exfoliation: Toward Selective Vapor Sensing. Advanced Functional Materials, 2019, 29, 1807004.	7.8	80
85	Integrated Biomonitoring Sensing with Wearable Asymmetric Supercapacitors Based on Ti₃C₂ MXene and 1Tâ€Phase WS₂ Nanosheets. Advanced Functional Materials, 2020, 30, 2003673.	7.8	80
86	Functional Protection of Exfoliated Black Phosphorus by Noncovalent Modification with Anthraquinone. ACS Nano, 2018, 12, 5666-5673.	7.3	79
87	High-pressure hydrogenation of graphene: towards graphane. Nanoscale, 2012, 4, 7006.	2.8	78
88	Transition Metal (Mn, Fe, Co, Ni)â€Doped Graphene Hybrids for Electrocatalysis. Chemistry - an Asian Journal, 2013, 8, 1295-1300.	1.7	78
89	Solutionâ€Based Processing of Optoelectronically Active Indium Selenide. Advanced Materials, 2018, 30, e1802990.	11.1	78
90	Ultrafast Electrochemical Trigger Drug Delivery Mechanism for Nanographene Micromachines. Advanced Functional Materials, 2019, 29, 1806696.	7.8	78

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91	Electrochemistry of layered GaSe and GeS: applications to ORR, OER and HER. Physical Chemistry Chemical Physics, 2016, 18, 1699-1711.	1.3	77
92	Unconventionally Layered CoTe₂ and NiTe₂ as Electrocatalysts for Hydrogen Evolution. Chemistry - A European Journal, 2017, 23, 11719-11726.	1.7	76
93	Catalytic and Lightâ€Driven ZnO/Pt Janus Nano/Micromotors: Switching of Motion Mechanism via Interface Roughness and Defect Tailoring at the Nanoscale. Advanced Functional Materials, 2019, 29, 1808678.	7.8	74
94	Precise Tuning of the Charge Transfer Kinetics and Catalytic Properties of MoS₂ Materials via Electrochemical Methods. Chemistry - A European Journal, 2014, 20, 17426-17432.	1.7	73
95	Uranium- and Thorium-Doped Graphene for Efficient Oxygen and Hydrogen Peroxide Reduction. ACS Nano, 2014, 8, 7106-7114.	7.3	73
96	Metal Phosphorous Trichalcogenides (MPCh₃): From Synthesis to Contemporary Energy Challenges. Angewandte Chemie - International Edition, 2019, 58, 9326-9337.	7.2	73
97	Boron and nitrogen doping of graphene via thermal exfoliation of graphite oxide in a BF3 or NH3 atmosphere: contrasting properties. Journal of Materials Chemistry A, 2013, 1, 13146.	5.2	72
98	Selfâ€Propelled Supercapacitors for Onâ€Demand Circuit Configuration Based on WS₂ Nanoparticles Micromachines. Advanced Functional Materials, 2016, 26, 6662-6667.	7.8	70
99	ZnO/ZnO₂/Pt Janus Micromotors Propulsion Mode Changes with Size and Interface Structure: Enhanced Nitroaromatic Explosives Degradation under Visible Light. ACS Applied Materials & Interfaces, 2018, 10, 42688-42697.	4.0	70
100	Products of Degradation of Black Phosphorus in Protic Solvents. ACS Nano, 2018, 12, 8390-8396.	7.3	70
101	Water-soluble highly fluorinated graphite oxide. RSC Advances, 2014, 4, 1378-1387.	1.7	69
102	Alternating Misfit Layered Transition/Alkaline Earth Metal Chalcogenide Ca₃Co₄O₉ as a New Class of Chalcogenide Materials for Hydrogen Evolution. Chemistry of Materials, 2014, 26, 4130-4136.	3.2	68
103	Surface Functionalization of 2D Transition Metal Oxides and Dichalcogenides via Covalent and Non-covalent Bonding for Sustainable Energy and Biomedical Applications. ACS Applied Nano Materials, 2020, 3, 3116-3143.	2.4	67
104	Chiral molecular intercalation superlattices. Nature, 2022, 606, 902-908.	13.7	67
105	Graphene-Supported 2D transition metal dichalcogenide van der waals heterostructures. Applied Materials Today, 2020, 19, 100600.	2.3	64
106	Exfoliated transition metal dichalcogenides (MoS2, MoSe2, WS2, WSe2): An electrochemical impedance spectroscopic investigation. Electrochemistry Communications, 2015, 50, 39-42.	2.3	62
107	Nitrogen doped graphene: influence of precursors and conditions of the synthesis. Journal of Materials Chemistry C, 2014, 2, 2887-2893.	2.7	61
108	Vacuum-assisted microwave reduction/exfoliation of graphite oxide and the influence of precursor graphite oxide. Carbon, 2014, 77, 508-517.	5.4	61

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109	2H â†' 1T Phase Change in Direct Synthesis of WS₂ Nanosheets via Solution-Based Electrochemical Exfoliation and Their Catalytic Properties. ACS Applied Materials & Interfaces, 2017, 9, 26350-26356.	4.0	61
110	Oleic acid/oleylamine ligand pair: a versatile combination in the synthesis of colloidal nanoparticles. Nanoscale Horizons, 2022, 7, 941-1015.	4.1	61
111	TaS₂, TaSe₂, and Their Heterogeneous Films as Catalysts for the Hydrogen Evolution Reaction. ACS Catalysis, 2020, 10, 3313-3325.	5.5	60
112	Boron-doped graphene and boron-doped diamond electrodes: detection of biomarkers and resistance to fouling. Analyst, The, 2013, 138, 4885.	1.7	59
113	Schwarzer Phosphor neu entdeckt: vom Volumenmaterial zu Monoschichten. Angewandte Chemie, 2017, 129, 8164-8185.	1.6	59
114	Interaction of single- and double-stranded DNA with multilayer MXene by fluorescence spectroscopy and molecular dynamics simulations. Chemical Science, 2019, 10, 10010-10017.	3.7	59
115	Cation-Controlled Electrocatalytical Activity of Transition-Metal Disulfides. ACS Catalysis, 2018, 8, 2774-2781.	5.5	58
116	Toward graphene chloride: chlorination of graphene and graphene oxide. RSC Advances, 2016, 6, 66884-66892.	1.7	56
117	Graphene Oxide Sorption Capacity toward Elements over the Whole Periodic Table: A Comparative Study. Journal of Physical Chemistry C, 2016, 120, 24203-24212.	1.5	56
118	Origin of exotic ferromagnetic behavior in exfoliated layered transition metal dichalcogenides MoS₂and WS₂. Nanoscale, 2016, 8, 1960-1967.	2.8	56
119	Functional Nanosheet Synthons by Covalent Modification of Transition-Metal Dichalcogenides. Chemistry of Materials, 2017, 29, 2066-2073.	3.2	56
120	Electrochemical Exfoliation of Layered Black Phosphorus into Phosphorene. Angewandte Chemie, 2017, 129, 10579-10581.	1.6	56
121	Graphitic carbon nitride: Effects of various precursors on the structural, morphological and electrochemical sensing properties. Applied Materials Today, 2017, 8, 150-162.	2.3	56
122	Layered PtTe₂ Matches Electrocatalytic Performance of Pt/C for Oxygen Reduction Reaction with Significantly Lower Toxicity. ACS Sustainable Chemistry and Engineering, 2018, 6, 7432-7441.	3.2	56
123	Liquid-Phase Exfoliated GeSe Nanoflakes for Photoelectrochemical-Type Photodetectors and Photoelectrochemical Water Splitting. ACS Applied Materials & Interfaces, 2020, 12, 48598-48613.	4.0	56
124	Nanoconfined deep eutectic solvent in laminated MXene for efficient CO2 separation. Chemical Engineering Journal, 2021, 405, 126961.	6.6	56
125	Interfacial Covalent Bonds Regulated Electronâ€Deficient 2D Black Phosphorus for Electrocatalytic Oxygen Reactions. Advanced Materials, 2021, 33, e2008752.	11.1	56
126	Towards graphene iodide: iodination of graphite oxide. Nanoscale, 2015, 7, 261-270.	2.8	54

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127	Layered rhenium sulfide on free-standing three-dimensional electrodes is highly catalytic for the hydrogen evolution reaction: Experimental and theoretical study. Electrochemistry Communications, 2016, 63, 39-43.	2.3	54
128	Fe(0)-embedded thermally reduced graphene oxide as efficient nanocatalyst for reduction of nitro compounds to amines. Chemical Engineering Journal, 2020, 382, 122469.	6.6	54
129	Direct Observation of Magnon-Phonon Strong Coupling in Two-Dimensional Antiferromagnet at High Magnetic Fields. Physical Review Letters, 2021, 127, 097401.	2.9	54
130	Impact Electrochemistry of Layered Transition Metal Dichalcogenides. ACS Nano, 2015, 9, 8474-8483.	7.3	53
131	Synthesis Protocols of the Most Common Layered Carbide and Nitride MAX Phases. Small Methods, 2020, 4, 1900780.	4.6	53
132	Enhancement of electrochemical and catalytic properties of MoS2 through ball-milling. Electrochemistry Communications, 2015, 54, 36-40.	2.3	51
133	Coke-derived graphene quantum dots as fluorescence nanoquencher in DNA detection. Applied Materials Today, 2017, 7, 138-143.	2.3	51
134	Layered Noble Metal Dichalcogenides: Tailoring Electrochemical and Catalytic Properties. ACS Applied Materials & Interfaces, 2017, 9, 25587-25599.	4.0	51
135	Black Phosphorus Nanoparticles Potentiate the Anticancer Effect of Oxaliplatin in Ovarian Cancer Cell Line. Advanced Functional Materials, 2017, 27, 1701955.	7.8	51
136	Nonconductive layered hexagonal boron nitride exfoliation by bipolar electrochemistry. Nanoscale, 2018, 10, 7298-7303.	2.8	51
137	Towards highly electrically conductive and thermally insulating graphene nanocomposites: Al₂O₃â€“graphene. RSC Advances, 2014, 4, 7418-7424.	1.7	50
138	Layered Transition-Metal Ditellurides in Electrocatalytic Applicationsâ€”Contrasting Properties. ACS Catalysis, 2017, 7, 5706-5716.	5.5	50
139	Niobium disulphide (NbS₂)-based (heterogeneous) electrocatalysts for an efficient hydrogen evolution reaction. Journal of Materials Chemistry A, 2019, 7, 25593-25608.	5.2	50
140	Highly hydrogenated graphene via active hydrogen reduction of graphene oxide in the aqueous phase at room temperature. Nanoscale, 2014, 6, 2153-2160.	2.8	49
141	Mo_xW_{1â^’x}S₂ Solid Solutions as 3D Electrodes for Hydrogen Evolution Reaction. Advanced Materials Interfaces, 2015, 2, 1500041.	1.9	49
142	Graphene oxide layers modified by light energetic ions. Physical Chemistry Chemical Physics, 2017, 19, 10282-10291.	1.3	49
143	Highly Hydrogenated Graphene through Microwave Exfoliation of Graphite Oxide in Hydrogen Plasma: Towards Electrochemical Applications. Chemistry - A European Journal, 2013, 19, 15583-15592.	1.7	48
144	Chemistry of Layered Pnictogens: Phosphorus, Arsenic, Antimony, and Bismuth. Angewandte Chemie - International Edition, 2019, 58, 7551-7557.	7.2	48

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145	A High-Performance Magnesium Triflate-based Electrolyte for Rechargeable Magnesium Batteries. Cell Reports Physical Science, 2020, 1, 100265.	2.8	48
146	Large-scale quantification of CVD graphene surface coverage. Nanoscale, 2013, 5, 2379.	2.8	47
147	CoO and Co3O4 nanoparticles with a tunable particle size. Ceramics International, 2014, 40, 12591-12595.	2.3	47
148	Transition Metal Oxides for the Oxygen Reduction Reaction: Influence of the Oxidation States of the Metal and its Position on the Periodic Table. ChemPhysChem, 2015, 16, 3527-3531.	1.0	47
149	Preparation of amorphous antimicrobial selenium nanoparticles stabilized by odor suppressing surfactant polysorbate 20. Materials Letters, 2015, 152, 207-209.	1.3	47
150	MAX and MAB Phases: Two-Dimensional Layered Carbide and Boride Nanomaterials for Electrochemical Applications. ACS Applied Nano Materials, 2019, 2, 6010-6021.	2.4	47
151	Concurrent Phosphorus Doping and Reduction of Graphene Oxide. Chemistry - A European Journal, 2014, 20, 4284-4291.	1.7	46
152	Ternary Transition Metal Oxide Nanoparticles with Spinel Structure for the Oxygen Reduction Reaction. ChemElectroChem, 2015, 2, 982-987.	1.7	46
153	Insight into the Mechanism of the Thermal Reduction of Graphite Oxide: Deuterium-Labeled Graphite Oxide Is the Key. ACS Nano, 2015, 9, 5478-5485.	7.3	46
154	Capacitance of pâ€•and nâ€Doped Graphenes is Dominated by Structural Defects Regardless of the Dopant Type. ChemSusChem, 2014, 7, 1102-1106.	3.6	45
155	Synthesis of Carboxylated-Graphenes by the Kolbeâ€“Schmitt Process. ACS Nano, 2017, 11, 1789-1797.	7.3	45
156	Tunable Roomâ€Temperature Synthesis of ReS₂ Bicatalyst on 3Dâ€•and 2Dâ€Printed Electrodes for Photoâ€•and Electrochemical Energy Applications. Advanced Functional Materials, 2020, 30, 1910193.	7.8	45
157	A New Member of the Graphene Family: Graphene Acid. Chemistry - A European Journal, 2016, 22, 17416-17424.	1.7	44
158	Synthesis of MnO, Mn2O3 and Mn3O4 nanocrystal clusters by thermal decomposition of manganese glycerolate. Ceramics International, 2015, 41, 595-601.	2.3	43
159	Bipolar Electrochemical Synthesis of WS₂ Nanoparticles and Their Application in Magnetoâ€Immunosandwich Assay. Advanced Functional Materials, 2016, 26, 4094-4098.	7.8	43
160	1Tâ€Phase WS₂ Proteinâ€Based Biosensor. Advanced Functional Materials, 2017, 27, 1604923.	7.8	43
161	Allâ€Solutionâ€Processed Van der Waals Heterostructures for Waferâ€Scale Electronics. Advanced Materials, 2022, 34, e2106110.	11.1	43
162	Oxygenâ€Free Highly Conductive Graphene Papers. Advanced Functional Materials, 2014, 24, 4878-4885.	7.8	42

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163	Valence and oxide impurities in MoS₂ and WS₂ dramatically change their electrocatalytic activity towards proton reduction. Nanoscale, 2016, 8, 16752-16760.	2.8	42
164	Ball-milled sulfur-doped graphene materials contain metallic impurities originating from ball-milling apparatus: their influence on the catalytic properties. Physical Chemistry Chemical Physics, 2016, 18, 17875-17880.	1.3	42
165	Recoverable Bismuth-Based Microrobots: Capture, Transport, and On-Demand Release of Heavy Metals and an Anticancer Drug in Confined Spaces. ACS Applied Materials & Interfaces, 2019, 11, 13359-13369.	4.0	42
166	MXene-Based Flexible Supercapacitors: Influence of an Organic Ionic Conductor Electrolyte on the Performance. ACS Applied Materials & Interfaces, 2020, 12, 53039-53048.	4.0	42
167	Grapheneâ€“Amorphous Transitionâ€Metal Chalcogenide (MoS_x,) Tj ETQq1 1 0.784314 rgBT /Overlock 10 Tf 50 Evolution Reaction. ChemElectroChem, 2016, 3, 565-571.	1.7	41
168	Triazine- and Heptazine-Based Carbon Nitrides: Toxicity. ACS Applied Nano Materials, 2018, 1, 4442-4449.	2.4	41
169	Two-Dimensional Gallium Sulfide Nanoflakes for UV-Selective Photoelectrochemical-type Photodetectors. Journal of Physical Chemistry C, 2021, 125, 11857-11866.	1.5	41
170	Electrochemistry of layered metal diborides. Nanoscale, 2018, 10, 11544-11552.	2.8	40
171	Chemical Preparation of Graphene Materials Results in Extensive Unintentional Doping with Heteroatoms and Metals. Chemistry - A European Journal, 2014, 20, 15760-15767.	1.7	39
172	Microwave Exfoliation of Graphite Oxides in H₂S Plasma for the Synthesis of Sulfur-Doped Graphenes as Oxygen Reduction Catalysts. ACS Applied Materials & Interfaces, 2016, 8, 31849-31855.	4.0	39
173	2D Stacks of MXene Ti₃C₂ and 1Tâ€Phase WS₂ with Enhanced Capacitive Behavior. ChemElectroChem, 2019, 6, 3982-3986.	1.7	39
174	Chemically-modified graphenes for oxidation of DNA bases: analytical parameters. Analyst, The, 2011, 136, 4738.	1.7	38
175	Neutron diffraction as a precise and reliable method for obtaining structural properties of bulk quantities of graphene. Nanoscale, 2014, 6, 13082-13089.	2.8	38
176	Direct electro-optical pumping for hybrid CdSe nanocrystal/III-nitride based nano-light-emitting diodes. Applied Physics Letters, 2016, 108, 061107.	1.5	38
177	Cytotoxicity of Exfoliated Layered Vanadium Dichalcogenides. Chemistry - A European Journal, 2017, 23, 684-690.	1.7	38
178	Morphological Effects and Stabilization of the Metallic 1T Phase in Layered Vâ€, Nbâ€, and Taâ€Đoped WSe₂ for Electrocatalysis. Chemistry - A European Journal, 2018, 24, 3199-3208.	1.7	38
179	Positive and Negative Effects of Dopants toward Electrocatalytic Activity of MoS₂ and WS₂: Experiments and Theory. ACS Applied Materials & Interfaces, 2020, 12, 20383-20392.	4.0	38
180	Prospective advances in MXene inks: screen printable sediments for flexible micro-supercapacitor applications. Journal of Materials Chemistry A, 2022, 10, 4533-4557.	5.2	38

#	Article	IF	Citations
181	Carbon fragments are ripped off from graphite oxide sheets during their thermal reduction. New Journal of Chemistry, 2014, 38, 5700-5705.	1.4	37
182	Cytotoxicity of halogenated graphenes. Nanoscale, 2014, 6, 1173-1180.	2.8	36
183	Layered titanium diboride: towards exfoliation and electrochemical applications. Nanoscale, 2015, 7, 12527-12534.	2.8	36
184	Highly selective removal of Ga 3+ ions from Al 3+ /Ga 3+ mixtures using graphite oxide. Carbon, 2015, 89, 121-129.	5.4	36
185	Lightâ€Driven ZnO Brushâ€Shaped Selfâ€Propelled Micromachines for Nitroaromatic Explosives Decomposition. Small, 2020, 16, e1902944.	5.2	36
186	High-yield exfoliation of 2D semiconductor monolayers and reassembly of organic/inorganic artificial superlattices. CheM, 2021, 7, 1887-1902.	5.8	36
187	Cytotoxicity Profile of Highly Hydrogenated Graphene. Chemistry - A European Journal, 2014, 20, 6366-6373.	1.7	35
188	A limited anodic and cathodic potential window of MoS₂: limitations in electrochemical applications. Nanoscale, 2015, 7, 3126-3129.	2.8	35
189	Atomically Thin Nanosheets Confined in 2D Heterostructures: Metalâ€Ion Batteries Prospective. Advanced Energy Materials, 2021, 11, 2100451.	10.2	35
190	3D-graphene for electrocatalysis of oxygen reduction reaction: Increasing number of layers increases the catalytic effect. Electrochemistry Communications, 2014, 46, 148-151.	2.3	34
191	Fluorographane (C₁H_xF_{1â^'xâ^'Î´})_n: synthesis and properties. Chemical Communications, 2015, 51, 5633-5636.	2.2	34
192	Group 6 Layered Transition-Metal Dichalcogenides in Lab-on-a-Chip Devices: 1T-Phase WS₂ for Microfluidics Non-Enzymatic Detection of Hydrogen Peroxide. Analytical Chemistry, 2017, 89, 4978-4985.	3.2	34
193	Fluorination of Black Phosphorusâ€"Will Black Phosphorus Burn Down in the Elemental Fluorine?. Advanced Functional Materials, 2018, 28, 1801438.	7.8	34
194	Cytotoxicity of Shear Exfoliated Pnictogen (As, Sb, Bi) Nanosheets. Chemistry - A European Journal, 2019, 25, 2242-2249.	1.7	34
195	MoSe₂ Nanolabels for Electrochemical Immunoassays. Analytical Chemistry, 2016, 88, 12204-12209.	3.2	33
196	2Hâ†'1T Phase Engineering of Layered Tantalum Disulfides in Electrocatalysis: Oxygen Reduction Reaction. Chemistry - A European Journal, 2017, 23, 8082-8091.	1.7	33
197	Nitrogen-doped graphene: effect of graphite oxide precursors and nitrogen content on the electrochemical sensing properties. Physical Chemistry Chemical Physics, 2017, 19, 15914-15923.	1.3	33
198	Investigation of electrocatalytic activity on a N-doped reduced graphene oxide surface for the oxygen reduction reaction in an alkaline medium. International Journal of Hydrogen Energy, 2018, 43, 12129-12139.	3.8	33

#	Article	IF	Citations
199	Non-aqueous solution-processed phosphorene by controlled low-potential electrochemical exfoliation and thin film preparation. Nanoscale, 2020, 12, 2638-2647.	2.8	33
200	Complex organic molecules are released during thermal reduction of graphite oxides. Physical Chemistry Chemical Physics, 2013, 15, 9257.	1.3	32
201	Towards Graphane Applications in Security: The Electrochemical Detection of Trinitrotoluene in Seawater on Hydrogenated Graphene. Electroanalysis, 2014, 26, 62-68.	1.5	32
202	Cytotoxicity of Group 5 Transition Metal Ditellurides (MTe₂; M=V, Nb, Ta). Chemistry - A European Journal, 2018, 24, 206-211.	1.7	32
203	1T-Phase Tungsten Chalcogenides (WS₂, WSe₂, WTe₂) Decorated with TiO₂ Nanoplatelets with Enhanced Electron Transfer Activity for Biosensing Applications. ACS Applied Nano Materials, 2018, 1, 7006-7015.	2.4	32
204	Understanding electrochemical capacitors with in-situ techniques. Renewable and Sustainable Energy Reviews, 2021, 149, 111418.	8.2	32
205	Towards Antimonene and 2D Antimony Telluride through Electrochemical Exfoliation. Chemistry - A European Journal, 2020, 26, 6583-6590.	1.7	32
206	Biomarkers Detection on Hydrogenated Graphene Surfaces: Towards Applications of Graphane in Biosensing. Electroanalysis, 2013, 25, 703-705.	1.5	31
207	Purification of carbon nanotubes by high temperature chlorine gas treatment. Physical Chemistry Chemical Physics, 2013, 15, 5615.	1.3	31
208	Toxicity of layered semiconductor chalcogenides: beware of interferences. RSC Advances, 2015, 5, 67485-67492.	1.7	31
209	Making Ultrafast Highâ€Capacity Anodes for Lithiumâ€Ion Batteries via Antimony Doping of Nanosized Tin Oxide/Graphene Composites. Advanced Functional Materials, 2018, 28, 1706529.	7.8	31
210	Functional 2D Germanene Fluorescent Coating of Microrobots for Micromachines Multiplexing. Small, 2020, 16, e1902365.	5.2	31
211	Cobalt Phosphorous Trisulfide as a High-Performance Electrocatalyst for the Oxygen Evolution Reaction. ACS Applied Materials & Interfaces, 2021, 13, 23638-23646.	4.0	31
212	Chiral Phonons and Giant Magnetoâ€Optical Effect in CrBr₃ 2D Magnet. Advanced Materials, 2021, 33, e2101618.	11.1	31
213	Transition Metalâ€Depleted Graphenes for Electrochemical Applications via Reduction of CO₂ by Lithium. Small, 2014, 10, 1529-1535.	5.2	30
214	Fluorographenes via thermal exfoliation of graphite oxide in SF₆, SF₄ and MoF₆ atmospheres. Journal of Materials Chemistry C, 2014, 2, 5198-5207.	2.7	30
215	Nanosized graphane (C₁H_{1.14})_n by hydrogenation of carbon nanofibers by Birch reduction method. RSC Advances, 2016, 6, 6475-6485.	1.7	30
216	Fluorographene Modified by Grignard Reagents: A Broad Range of Functional Nanomaterials. Chemistry - A European Journal, 2017, 23, 1956-1964.	1.7	30

#	Article	IF	Citations
217	TaS₃ Nanofibers: Layered Trichalcogenide for High-Performance Electronic and Sensing Devices. ACS Nano, 2018, 12, 464-473.	7.3	30
218	A highly sensitive room temperature humidity sensor based on 2D-WS2 nanosheets. FlatChem, 2018, 9, 21-26.	2.8	30
219	Nitrogen-doped graphene based triboelectric nanogenerators. Nano Energy, 2021, 87, 106173.	8.2	30
220	Iridiumâ€and Osmiumâ€decorated Reduced Graphenes as Promising Catalysts for Hydrogen Evolution. ChemPhysChem, 2015, 16, 1898-1905.	1.0	29
221	Layered Postâ€Transitionâ€Metal Dichalcogenides (Xâ^'Mâ^'Mâ^'X) and Their Properties. Chemistry - A European Journal, 2016, 22, 18810-18816.	1.7	29
222	Fast Synthesis of Highly Oxidized Graphene Oxide. ChemistrySelect, 2017, 2, 9000-9006.	0.7	29
223	Metallic impurities in black phosphorus nanoflakes prepared by different synthetic routes. Nanoscale, 2018, 10, 1540-1546.	2.8	29
224	Elements beyond graphene: Current state and perspectives of elemental monolayer deposition by bottom-up approach. Applied Materials Today, 2020, 18, 100502.	2.3	29
225	Influence of parent graphite particle size on the electrochemistry of thermally reduced graphene oxide. Physical Chemistry Chemical Physics, 2012, 14, 12794.	1.3	28
226	Efficient heat dissipation in AlGaN/GaN heterostructure grown on silver substrate. Applied Materials Today, 2017, 7, 134-137.	2.3	28
227	Exfoliated transition metal dichalcogenide (MX2; M = Mo, W; X = S, Se, Te) nanosheets and their composites with polyaniline nanofibers for electrochemical capacitors. Applied Materials Today, 2019, 16, 280-289.	2.3	28
228	Atomic Layer Deposition as a General Method Turns any 3Dâ€Printed Electrode into a Desired Catalyst: Case Study in Photoelectrochemisty. Advanced Energy Materials, 2019, 9, 1900994.	10.2	28
229	Recyclable nanographene-based micromachines for the on-the-fly capture of nitroaromatic explosives. Nanoscale, 2019, 11, 8825-8834.	2.8	28
230	Shear-force exfoliation of indium and gallium chalcogenides for selective gas sensing applications. Nanoscale, 2019, 11, 4310-4317.	2.8	28
231	Biohybrid Micro- and Nanorobots for Intelligent Drug Delivery. Cyborg and Bionic Systems, 2022, 2022, .	3.7	28
232	Impact electrochemistry of individual molybdenum nanoparticles. Electrochemistry Communications, 2015, 56, 16-19.	2.3	27
233	Layered Black Phosphorus: Strongly Anisotropic Magnetic, Electronic, and Electronâ€Transfer Properties. Angewandte Chemie, 2016, 128, 3443-3447.	1.6	27
234	Molecular-level fabrication of highly selective composite ZIF-8-CNT-PDMS membranes for effective CO2/N2, CO2/H2 and olefin/paraffin separations. Separation and Purification Technology, 2021, 274, 119003.	3.9	27

#	Article	IF	Citations
235	Mesomeric Effects of Graphene Modified with Diazonium Salts: Substituent Type and Position Influence its Properties. Chemistry - A European Journal, 2015, 21, 17728-17738.	1.7	26
236	Hydrogenated Graphenes by Birch Reduction: Influence of Electron and Proton Sources on Hydrogenation Efficiency, Magnetism, and Electrochemistry. Chemistry - A European Journal, 2015, 21, 16828-16838.	1.7	26
237	Phase diagram of the Srâ€“Coâ€“O system. Journal of the European Ceramic Society, 2015, 35, 935-940.	2.8	26
238	Lipase enzymes on graphene oxide support for high-efficiency biocatalysis. Applied Materials Today, 2016, 5, 200-208.	2.3	26
239	Simple Synthesis of Fluorinated Graphene: Thermal Exfoliation of Fluorographite. Chemistry - A European Journal, 2016, 22, 17696-17703.	1.7	26
240	Thin, Highâ€Flux, Selfâ€Standing, Graphene Oxide Membranes for Efficient Hydrogen Separation from Gas Mixtures. Chemistry - A European Journal, 2017, 23, 11416-11422.	1.7	26
241	The Covalent Functionalization of Layered Black Phosphorus by Nucleophilic Reagents. Angewandte Chemie, 2017, 129, 10023-10028.	1.6	26
242	Oneâ€Step Synthesis of B/N Coâ€doped Graphene as Highly Efficient Electrocatalyst for the Oxygen Reduction Reaction: Synergistic Effect of Impurities. Chemistry - A European Journal, 2018, 24, 928-936.	1.7	26
243	Chemistry of Germanene: Surface Modification of Germanane Using Alkyl Halides. ACS Nano, 2020, 14, 7319-7327.	7.3	26
244	Liquid Metalsâ€Assisted Synthesis of Scalable 2D Nanomaterials: Prospective Sediment Inks for Screenâ€Printed Energy Storage Applications. Advanced Functional Materials, 2021, 31, 2010320.	7.8	26
245	Iridiumâ€Catalystâ€Based Autonomous Bubbleâ€Propelled Graphene Micromotors with Ultralow Catalyst Loading. Chemistry - A European Journal, 2014, 20, 14946-14950.	1.7	25
246	High temperature superconducting materials as bi-functional catalysts for hydrogen evolution and oxygen reduction. Journal of Materials Chemistry A, 2015, 3, 8346-8352.	5.2	25
247	Separation of thorium ions from wolframite and scandium concentrates using graphene oxide. Physical Chemistry Chemical Physics, 2015, 17, 25272-25277.	1.3	25
248	Doped Graphene for DNA Analysis: the Electrochemical Signal is Strongly Influenced by the Kind of Dopant and the Nucleobase Structure. Scientific Reports, 2016, 6, 33046.	1.6	25
249	Synthesis of Graphene Oxide by Oxidation of Graphite with Ferrate(VI) Compounds: Myth or Reality?. Angewandte Chemie - International Edition, 2016, 55, 11965-11969.	7.2	25
250	Microwave irradiated N- and B,Cl-doped graphene: Oxidation method has strong influence on capacitive behavior. Applied Materials Today, 2017, 9, 204-211.	2.3	25
251	MoSe₂ Dispersed in Stabilizing Surfactant Media: Effect of the Surfactant Type and Concentration on Electron Transfer and Catalytic Properties. ACS Applied Materials & Interfaces, 2018, 10, 17820-17826.	4.0	25
252	Localized modification of graphene oxide properties by laser irradiation in vacuum. Vacuum, 2019, 165, 134-138.	1.6	25

#	Article	IF	Citations
253	Enhanced voltammetric determination of metal ions by using a bismuthene-modified screen-printed electrode. Electrochimica Acta, 2020, 362, 137144.	2.6	25
254	Carbonaceous Oxygen Evolution Reaction Catalysts: From Defect and Dopingâ€Induced Activity over Hybrid Compounds to Ordered Framework Structures. Small, 2021, 17, e2007484.	5.2	25
255	Phosphorene and other layered pnictogens as a new source of 2D materials for electrochemical sensors. TrAC - Trends in Analytical Chemistry, 2021, 139, 116249.	5.8	25
256	Concentration of Nitric Acid Strongly Influences Chemical Composition of Graphite Oxide. Chemistry - A European Journal, 2017, 23, 6432-6440.	1.7	24
257	WSe₂ nanoparticles with enhanced hydrogen evolution reaction prepared by bipolar electrochemistry: application in competitive magneto-immunoassay. Nanoscale, 2018, 10, 23149-23156.	2.8	24
258	Cytotoxicity of layered metal phosphorus chalcogenides (MPXY) nanoflakes; FePS3, CoPS3, NiPS3. FlatChem, 2018, 12, 1-9.	2.8	24
259	Antimony Chalcogenide van der Waals Nanostructures for Energy Conversion and Storage. ACS Sustainable Chemistry and Engineering, 2019, 7, 15790-15798.	3.2	24
260	MoS₂ versatile spray-coating of 3D electrodes for the hydrogen evolution reaction. Nanoscale, 2019, 11, 9888-9895.	2.8	24
261	6FDA-DAM:DABA Co-Polyimide Mixed Matrix Membranes with GO and ZIF-8 Mixtures for Effective CO2/CH4 Separation. Nanomaterials, 2021, 11, 668.	1.9	24
262	Graphene Sheet Orientation of Parent Material Exhibits Dramatic Influence on Graphene Properties. Chemistry - an Asian Journal, 2012, 7, 2367-2372.	1.7	23
263	Synthesis of Graphene Oxide by Oxidation of Graphite with Ferrate(VI) Compounds: Myth or Reality?. Angewandte Chemie, 2016, 128, 12144-12148.	1.6	23
264	Cytotoxicity of phosphorus allotropes (black, violet, red). Applied Materials Today, 2018, 13, 310-319.	2.3	23
265	Covalent Functionalization of Exfoliated Arsenic with Chlorocarbene. Angewandte Chemie - International Edition, 2018, 57, 14837-14840.	7.2	23
266	Effects of the ion bombardment on the structure and composition of GO and rGO foils. Materials Chemistry and Physics, 2019, 232, 272-277.	2.0	23
267	â€œTop-downâ€•Arsenene Production by Low-Potential Electrochemical Exfoliation. Inorganic Chemistry, 2020, 59, 11259-11265.	1.9	23
268	Large-Scale Production of Nanocrystalline Black Phosphorus Ceramics. ACS Applied Materials & Interfaces, 2020, 12, 7381-7391.	4.0	23
269	Inverted perovskite solar cells with enhanced lifetime and thermal stability enabled by a metallic tantalum disulfide buffer layer. Nanoscale Advances, 2021, 3, 3124-3135.	2.2	23
270	High-Entropy NASICON Phosphates (Na₃M₂(PO₄)₃ and) Tj ETQq0 0 0 rgBT /Overlo Inorganic Chemistry, 2022, 61, 4092-4101.	1.9	23

#	Article	IF	Citations
271	Topochemical Transformation of Two-Dimensional VSe₂ into Metallic Nonlayered VO₂ for Water Splitting Reactions in Acidic and Alkaline Media. ACS Nano, 2022, 16, 351-367.	7.3	23
272	Functionalization of Hydrogenated Graphene: Transitionâ€Metalâ€Catalyzed Crossâ€Coupling Reactions of Allylic Câ^'Hâ€‰Bonds. Angewandte Chemie - International Edition, 2016, 55, 10751-10754.	7.2	22
273	Phosphorus and Halogen Coâ€Doped Graphene Materials and their Electrochemistry. Chemistry - A European Journal, 2016, 22, 15444-15450.	1.7	22
274	Universal Method for Largeâ€Scale Synthesis of Layered Transition Metal Dichalcogenides. Chemistry - A European Journal, 2017, 23, 10177-10186.	1.7	22
275	Graphene oxide layers modified by irradiation with 1.2â€¯MeV He+ ions. Surface and Coatings Technology, 2018, 342, 220-225.	2.2	22
276	Binary Phosphorene Redox Behavior in Oxidoreductase Enzymatic Systems. ACS Nano, 2019, 13, 13217-13224.	7.3	22
277	Hot Carrier and Surface Recombination Dynamics in Layered InSe Crystals. Journal of Physical Chemistry Letters, 2019, 10, 493-499.	2.1	22
278	Black phosphorusâ€“arsenic alloys for lithium ion batteries. FlatChem, 2020, 19, 100143.	2.8	22
279	Smartdust 3Dâ€Printed Grapheneâ€Based Al/Ga Robots for Photocatalytic Degradation of Explosives. Small, 2020, 16, 2002111.	5.2	22
280	Emerging pnictogen-based 2D semiconductors: sensing and electronic devices. Nanoscale, 2020, 12, 10430-10446.	2.8	22
281	Functionalized metallic transition metal dichalcogenide (TaS₂) for nanocomposite membranes in direct methanol fuel cells. Journal of Materials Chemistry A, 2021, 9, 6368-6381.	5.2	22
282	Comparison between layered Pt3Te4 and PtTe2 for electrocatalytic reduction reactions. FlatChem, 2021, 29, 100280.	2.8	22
283	Layer-Dependent Interlayer Antiferromagnetic Spin Reorientation in Air-Stable Semiconductor CrSBr. ACS Nano, 2022, 16, 11876-11883.	7.3	22
284	Graphane electrochemistry: Electron transfer at hydrogenated graphenes. Electrochemistry Communications, 2012, 25, 58-61.	2.3	21
285	Highly selective uptake of Ba²⁺and Sr²⁺ions by graphene oxide from mixtures of IIA elements. RSC Advances, 2014, 4, 26673-26676.	1.7	21
286	Fine tuning of graphene properties by modification with aryl halogens. Nanoscale, 2016, 8, 1493-1502.	2.8	21
287	Selective Bromination of Graphene Oxide by the Hunsdiecker Reaction. Chemistry - A European Journal, 2017, 23, 10473-10479.	1.7	21
288	Acetonitrile-assisted exfoliation of layered grey and black arsenic: contrasting properties. Nanoscale Advances, 2020, 2, 1282-1289.	2.2	21

#	Article	IF	Citations
289	Spectroscopic thickness and quality metrics for PtSe₂ layers produced by top-down and bottom-up techniques. 2D Materials, 2020, 7, 045027.	2.0	21
290	Simple synthesis of Cr2O3 nanoparticles with a tunable particle size. Ceramics International, 2015, 41, 4644-4650.	2.3	20
291	Nearâ€Stoichiometric Bulk Graphane from Halogenated Graphenes (X = Cl/Br/I) by the Birch Reduction for High Density Energy Storage. Advanced Functional Materials, 2017, 27, 1605797.	7.8	20
292	The Origin of MoS₂ Significantly Influences Its Performance for the Hydrogen Evolution Reaction due to Differences in Phase Purity. Chemistry - A European Journal, 2017, 23, 3169-3177.	1.7	20
293	Black-phosphorus-enhanced bubble-propelled autonomous catalytic microjets. Applied Materials Today, 2017, 9, 289-291.	2.3	20
294	In Situ Doping of Black Phosphorus by High-Pressure Synthesis. Inorganic Chemistry, 2019, 58, 10227-10238.	1.9	20
295	Electrochemistry of Layered Semiconducting A^{III}B^{VI} Chalcogenides: Indium Monochalcogenides (InS, InSe, InTe). ChemCatChem, 2019, 11, 2634-2642.	1.8	20
296	Layered Crystalline and Amorphous Platinum Disulfide (PtS₂): Contrasting Electrochemistry. Chemistry - A European Journal, 2019, 25, 7330-7338.	1.7	20
297	Ambient-Stable Two-Dimensional CrI₃ via Organic-Inorganic Encapsulation. ACS Nano, 2021, 15, 10659-10667.	7.3	20
298	Synthesis, magnetic and transport properties of oxygen-free CrN ceramics. Journal of the European Ceramic Society, 2014, 34, 4131-4136.	2.8	19
299	Selective Nitrogen Functionalization of Graphene by Bucherer–Type Reaction. Chemistry - A European Journal, 2015, 21, 8090-8095.	1.7	19
300	Definitive Insight into the Graphite Oxide Reduction Mechanism by Deuterium Labeling. ChemPlusChem, 2015, 80, 1399-1407.	1.3	19
301	The dopant type and amount governs the electrochemical performance of graphene platforms for the antioxidant activity quantification. Nanoscale, 2015, 7, 9040-9045.	2.8	19
302	Surface properties of MoS₂ probed by inverse gas chromatography and their impact on electrocatalytic properties. Nanoscale, 2017, 9, 19236-19244.	2.8	19
303	In vitro cytotoxicity of covalently protected layered molybdenum disulfide. Applied Materials Today, 2018, 11, 200-206.	2.3	19
304	Black Phosphorus Synthesis Path Strongly Influences Its Delamination, Chemical Properties and Electrochemical Performance. ACS Applied Energy Materials, 2018, 1, 503-509.	2.5	19
305	Catalytic hydrogen evolution reaction on â€œmetal-freeâ€•graphene: key role of metallic impurities. Nanoscale, 2019, 11, 11083-11085.	2.8	19
306	Potential Dependent Electrochemical Exfoliation of NiPS₃ and Implications for Hydrogen Evolution Reaction. ACS Applied Energy Materials, 2020, 3, 11992-11999.	2.5	19

#	Article	IF	Citations
307	Niobium-doped TiS2: Formation of TiS3 nanobelts and their effects in enzymatic biosensors. Biosensors and Bioelectronics, 2020, 155, 112114.	5.3	19
308	Rhenium Doping of Layered Transition-Metal Diselenides Triggers Enhancement of Photoelectrochemical Activity. ACS Nano, 2021, 15, 2374-2385.	7.3	19
309	Cytotoxicity of fluorographene. RSC Advances, 2015, 5, 107158-107165.	1.7	18
310	Impact Electrochemistry: Detection of Graphene Nanosheets Labeled with Metal Nanoparticles through Oxygen Reduction Mediation. ChemPhysChem, 2016, 17, 2096-2099.	1.0	18
311	Anti-MoS₂ Nanostructures: Tl₂S and Its Electrochemical and Electronic Properties. ACS Nano, 2016, 10, 112-123.	7.3	18
312	Layered franckeite and teallite intrinsic heterostructures: shear exfoliation and electrocatalysis. Journal of Materials Chemistry A, 2018, 6, 16590-16599.	5.2	18
313	Micromotors as â€œMothershipsâ€• A Concept for the Transport, Delivery, and Enzymatic Release of Molecular Cargo via Nanoparticles. Langmuir, 2019, 35, 10618-10624.	1.6	18
314	Exfoliation of Calcium Germanide by Alkyl Halides. Chemistry of Materials, 2019, 31, 10126-10134.	3.2	18
315	Tuning of electrocatalytic properties of MoS2 by chalcogenide ion implantation. Applied Materials Today, 2019, 14, 216-223.	2.3	18
316	Black Phosphorus Cytotoxicity Assessments Pitfalls: Advantages and Disadvantages of Metabolic and Morphological Assays. Chemistry - A European Journal, 2019, 25, 349-360.	1.7	18
317	Microwaveâ€Induced Structural Engineering and Pt Trapping in 6Râ€TaS₂ for the Hydrogen Evolution Reaction. Small, 2020, 16, e2003372.	5.2	18
318	Liquidâ€Phase Exfoliated Gallium Selenide for Lightâ€Driven Thinâ€Film Transistors. Advanced Electronic Materials, 2021, 7, 2001080.	2.6	18
319	Sulfur poisoning of emergent and current electrocatalysts: vulnerability of MoS₂, and direct correlation to Pt hydrogen evolution reaction kinetics. Nanoscale, 2015, 7, 8879-8883.	2.8	17
320	Synthesis of spherical amorphous selenium nano and microparticles with tunable sizes. Micro and Nano Letters, 2016, 11, 91-93.	0.6	17
321	Germanane synthesis with simultaneous covalent functionalization: towards highly functionalized fluorescent germananes. Nanoscale, 2019, 11, 19327-19333.	2.8	17
322	Lightâ€Driven Sandwich ZnO/TiO₂/Pt Janus Micromotors: Schottky Barrier Suppression by Addition of TiO₂ Atomic Interface Layers into ZnO/Pt Micromachines Leading to Enhanced Fuelâ€Free Propulsion. Small Methods, 2019, 3, 1900258.	4.6	17
323	Molecular-Scale Characterization of Photoinduced Charge Separation in Mixed-Dimensional InSeâ€“Organic van der Waals Heterostructures. ACS Nano, 2020, 14, 3509-3518.	7.3	17
324	Intrinsic carrier multiplication in layered Bi2O2Se avalanche photodiodes with gain bandwidth product exceeding 1 GHz. Nano Research, 2021, 14, 1961-1966.	5.8	17

#	Article	IF	Citations
325	Functionalized Germanene-Based Nanomaterials for the Detection of Single Nucleotide Polymorphism. ACS Applied Nano Materials, 2021, 4, 5164-5175.	2.4	17
326	Layered ZnIn₂S₄ Single Crystals for Ultrasensitive and Wearable Photodetectors. Advanced Optical Materials, 2021, 9, 2100845.	3.6	17
327	Highly exfoliated NiPS3 nanosheets as efficient electrocatalyst for high yield ammonia production. Chemical Engineering Journal, 2022, 430, 132649.	6.6	17
328	Sub-millimetre scale Van der Waals single-crystal MoTe2 for potassium storage: Electrochemical properties, and its failure and structure evolution mechanisms. Energy Storage Materials, 2021, 43, 284-292.	9.5	17
329	Surface oxidation of Ti₃C₂T_x enhances the catalytic activity of supported platinum nanoparticles in ammonia borane hydrolysis. 2D Materials, 2021, 8, 015001.	2.0	17
330	Growth and properties of GaN and AlN layers on silver substrates. Applied Physics Letters, 2005, 87, 212109.	1.5	16
331	Femtosecond and highly sensitive GaAs metalâ€“semiconductorâ€“metal photodetectors grown on aluminum mirrors/pseudo-substrates. Semiconductor Science and Technology, 2010, 25, 075001.	1.0	16
332	Heat capacity, enthalpy and entropy of Sr14Co11O33 and Sr6Co5O15. Thermochimica Acta, 2014, 575, 167-172.	1.2	16
333	Synthesis, structure, thermal, transport and magnetic properties of VN ceramics. Ceramics International, 2016, 42, 18779-18784.	2.3	16
334	Ultrapure Molybdenum Disulfide Shows Enhanced Catalysis for Hydrogen Evolution over Impuritiesâ€Doped Counterpart. ChemCatChem, 2017, 9, 1168-1171.	1.8	16
335	Boron and Nitrogen Doped Graphene via Microwave Exfoliation for Simultaneous Electrochemical Detection of Ascorbic Acid, Dopamine and Uric Acid. Electroanalysis, 2017, 29, 45-50.	1.5	16
336	Single-Step Synthesis of Platinoid-Decorated Phosphorene: Perspectives for Catalysis, Gas Sensing, and Energy Storage. ACS Applied Materials & Interfaces, 2020, 12, 50516-50526.	4.0	16
337	MoS₂ stacking matters: 3R polytype significantly outperforms 2H MoS₂ for the hydrogen evolution reaction. Nanoscale, 2021, 13, 19391-19398.	2.8	16
338	Definitive proof of graphene hydrogenation by Clemmensen reduction: use of deuterium labeling. Nanoscale, 2015, 7, 10535-10543.	2.8	15
339	Cloisite Microrobots as Self-Propelling Cleaners for Fast and Efficient Removal of Improvised Organophosphate Nerve Agents. ACS Applied Materials & Interfaces, 2019, 11, 31832-31843.	4.0	15
340	Chalcogenide vacancies drive the electrocatalytic performance of rhenium dichalcogenides. Nanoscale, 2019, 11, 14684-14690.	2.8	15
341	Boron and nitrogen dopants in graphene have opposite effects on the electrochemical detection of explosive nitroaromatic compounds. Electrochemistry Communications, 2020, 112, 106660.	2.3	15
342	Bipolar Electrochemistry Exfoliation of Layered Metal Chalcogenides Sb₂S₃ and Bi₂S₃ and their Hydrogen Evolution Applications. Chemistry - A European Journal, 2020, 26, 6479-6483.	1.7	15

#	Article	IF	Citations
343	Freeâ€Standing Black Phosphorus Foils for Energy Storage and Catalysis. Chemistry - A European Journal, 2020, 26, 8162-8169.	1.7	15
344	Molybdenum Oxide Supported on Ti₃AlC₂ is an Active Reverse Waterâ€“Gas Shift Catalyst. ACS Sustainable Chemistry and Engineering, 2021, 9, 4957-4966.	3.2	15
345	Edge-Hydrogenated Germanene by Electrochemical Decalcification-Exfoliation of CaGe₂: Germanene-Enabled Vapor Sensor. ACS Nano, 2021, 15, 16709-16718.	7.3	15
346	Electrochemical Fluorographane: Hybrid Electrocatalysis of Biomarkers, Hydrogen Evolution, and Oxygen Reduction. Chemistry - A European Journal, 2015, 21, 16474-16478.	1.7	14
347	Transitional Metal/Chalcogen Dependant Interactions of Hairpin DNA with Transition Metal Dichalcogenides, MX₂. ChemPhysChem, 2015, 16, 2304-2306.	1.0	14
348	Use of deuterium labellingâ€"evidence of graphene hydrogenation by reduction of graphite oxide using aluminium in sodium hydroxide. RSC Advances, 2015, 5, 18733-18739.	1.7	14
349	Supercapacitors in Motion: Autonomous Microswimmers for Naturalâ€Resource Recovery. Angewandte Chemie - International Edition, 2019, 58, 13340-13344.	7.2	14
350	Alkali Metal Arenides as a Universal Synthetic Tool for Layered 2D Germanene Modification. Angewandte Chemie - International Edition, 2019, 58, 16517-16522.	7.2	14
351	Chemistry of Layered Pnictogens: Phosphorus, Arsenic, Antimony, and Bismuth. Angewandte Chemie, 2019, 131, 7631-7637.	1.6	14
352	Vanadium Dopants: A Boon or a Bane for Molybdenum Dichalcogenidesâ€Based Electrocatalysis Applications. Advanced Functional Materials, 2021, 31, 2009083.	7.8	14
353	Surface Engineering Strategy Using Urea To Improve the Rate Performance of Na₂Ti₃O₇ in Naâ€Ion Batteries. Chemistry - A European Journal, 2021, 27, 3875-3886.	1.7	14
354	Magnetic control of electrochemical processes at electrode surface using iron-rich graphene materials with dual functionality. Nanoscale, 2014, 6, 7391-7396.	2.8	13
355	Effect of Electrolyte pH on the Inherent Electrochemistry of Layered Transitionâ€Metal Dichalcogenides (MoS₂, MoSe₂, WS₂, WSe₂). ChemElectroChem, 2015, 2, 1713-1718.	1.7	13
356	Simultaneous self-exfoliation and autonomous motion of MoS₂particles in water. Chemical Communications, 2015, 51, 9899-9902.	2.2	13
357	Geographical and Geological Origin of Natural Graphite Heavily Influence the Electrical and Electrochemical Properties of Chemically Modified Graphenes. Chemistry - A European Journal, 2015, 21, 8435-8440.	1.7	13
358	Structural and optical properties of Gd implanted GaN with various crystallographic orientations. Thin Solid Films, 2017, 638, 63-72.	0.8	13
359	Effect of surface chemistry on bio-conjugation and bio-recognition abilities of 2D germanene materials. Nanoscale, 2021, 13, 1893-1903.	2.8	13
360	Prediction Clue on the Fading Capacity of Multi-Walled Carbon Nanotube-Decorated Li₂(Fe_{1â€“x}Ti_x)SiO₄/C High-Performance Cathode Materials. Energy & Fuels, 2021, 35, 8321-8333.	2.5	13

#	Article	IF	Citations
361	Self-Powered Broadband Photodetector and Sensor Based on Novel Few-Layered Pd₃(PS₄)₂ Nanosheets. ACS Applied Materials & Interfaces, 2021, 13, 30806-30817.	4.0	13
362	Functionalized germanane/SWCNT hybrid films as flexible anodes for lithium-ion batteries. Nanoscale Advances, 2021, 3, 4440-4446.	2.2	13
363	2D Heterostructures for Highly Efficient Photodetectors: From Advanced Synthesis to Characterizations, Mechanisms, and Device Applications. Advanced Photonics Research, 2022, 3, .	1.7	13
364	Electromagnetic Interference Shielding by Reduced Graphene Oxide Foils. ACS Applied Nano Materials, 2022, 5, 6792-6800.	2.4	13
365	Nano-crystals of various lanthanide fluorides prepared using the ionic liquid bmimPF6. Journal of Fluorine Chemistry, 2013, 149, 13-17.	0.9	12
366	Hydroboration of Graphene Oxide: Towards Stoichiometric Graphol and Hydroxygraphane. Chemistry - A European Journal, 2015, 21, 8130-8136.	1.7	12
367	Functionalization of Hydrogenated Graphene: Transitionâ€Metalâ€Catalyzed Crossâ€Coupling Reactions of Allylic Câ^'Hâ€‰Bonds. Angewandte Chemie, 2016, 128, 10909-10912.	1.6	12
368	MoS₂/WS₂â€Graphene Composites through Thermal Decomposition of Tetrathiomolybdate/Tetrathiotungstate for Proton/Oxygen Electroreduction. ChemPhysChem, 2016, 17, 2890-2896.	1.0	12
369	Doped and undoped graphene platforms: the influence of structural properties on the detection of polyphenols. Scientific Reports, 2016, 6, 20673.	1.6	12
370	Synergetic Metals on Carbocatalyst Shungite. Chemistry - A European Journal, 2017, 23, 18232-18238.	1.7	12
371	Graphene oxide layers modified by irradiation with 1.0 MeV Au⁺ ions. Surface and Interface Analysis, 2018, 50, 1110-1115.	0.8	12
372	Localized deoxygenation of graphene oxide foil by ion microbeam writing. Vacuum, 2019, 163, 10-14.	1.6	12
373	Black arsenic: a new synthetic method by catalytic crystallization of arsenic glass. Nanoscale, 2020, 12, 5397-5401.	2.8	12
374	Electrochemical Exfoliation of Janus-like BiTeI Nanosheets for Electrocatalytic Nitrogen Reduction. ACS Applied Nano Materials, 2021, 4, 590-599.	2.4	12
375	Photocatalytic activity of twist-angle stacked 2D TaS2. Npj 2D Materials and Applications, 2021, 5, .	3.9	12
376	Flexible, ultralight, and high-energy density electrochemical capacitors using sustainable materials. Electrochimica Acta, 2022, 415, 140239.	2.6	12
377	Improving Câ€“Nâ€“FeO_x Oxygen Evolution Electrocatalysts through Hydroxyl-Modulated Local Coordination Environment. ACS Catalysis, 2022, 12, 7443-7452.	5.5	12
378	Electrochemical properties of layered SnO and PbO for energy applications. RSC Advances, 2015, 5, 101949-101958.	1.7	11

#	Article	IF	Citations
379	Contrasts between Mild and Harsh Oxidation of Carbon Nanotubes in terms of their Properties and Electrochemical Performance. ChemElectroChem, 2016, 3, 1713-1719.	1.7	11
380	Partially Hydrogenated Graphene Materials Exhibit High Electrocatalytic Activities Related to Unintentional Doping with Metallic Impurities. Chemistry - A European Journal, 2016, 22, 8627-8634.	1.7	11
381	Reducing emission of carcinogenic by-products in the production of thermally reduced graphene oxide. Green Chemistry, 2016, 18, 6618-6629.	4.6	11
382	MoS₂ Nanoparticles as Electrocatalytic Labels in Magneto-Immunoassays. ACS Applied Materials & Interfaces, 2018, 10, 16861-16866.	4.0	11
383	Graphite oxide based targets applied in laser matter interaction. EPJ Web of Conferences, 2018, 167, 02004.	0.1	11
384	Unique wettability phenomenon of carbon-bonded alumina with advanced nanocoating. Applied Materials Today, 2018, 13, 24-31.	2.3	11
385	Noncovalent Functionalization of Pnictogen Surfaces: From Small Molecules to 2D Heterostructures. Small, 2019, 15, e1903495.	5.2	11
386	Mildly oxidized SWCNT as new potential support membrane material for effective H2/CO2 separation. Applied Materials Today, 2019, 15, 335-342.	2.3	11
387	The Structural and Compositional Changes of Graphene Oxide Induced by Irradiation With 500â€‰keV Helium and Gallium Ions. Physica Status Solidi (B): Basic Research, 2019, 256, 1800409.	0.7	11
388	Layered platinum dichalcogenides (PtS2, PtSe2, PtTe2) for non-enzymatic electrochemical sensor. Applied Materials Today, 2020, 19, 100606.	2.3	11
389	Autogenous Formation of Gold on Layered Black Phosphorus for Catalytic Purification of Waste Water. ACS Applied Materials & Interfaces, 2020, 12, 22702-22709.	4.0	11
390	CeO2-Blended Cellulose Triacetate Mixed-Matrix Membranes for Selective CO2 Separation. Membranes, 2021, 11, 632.	1.4	11
391	Colloidal chemical bottom-up synthesis routes of pnictogen (As, Sb, Bi) nanostructures with tailored properties and applications: a summary of the state of the art and main insights. CrystEngComm, 2021, 23, 7876-7898.	1.3	11
392	Exfoliated Fe3GeTe2 and Ni3GeTe2 materials as water splitting electrocatalysts. FlatChem, 2022, 32, 100334.	2.8	11
393	Flux growth of ZnO crystals doped by transition metals. Journal of Crystal Growth, 2011, 314, 123-128.	0.7	10
394	Fluorinated Nanocarbons Cytotoxicity. Chemistry - A European Journal, 2015, 21, 13020-13026.	1.7	10
395	Enhanced colloidal stability of nanoscale zero valent iron particles in the presence of sodium silicate water glass. Environmental Technology (United Kingdom), 2015, 36, 358-365.	1.2	10
396	Misfitâ€Layered Bi_{1.85}Sr₂Co_{1.85}O_{7.7â^'Î´} for the Hydrogen Evolution Reaction: Beyond van der Waals Heterostructures. ChemPhysChem, 2015, 16, 769-774.	1.0	10

#	Article	IF	Citations
397	Inherent Electrochemistry of Layered Postâ€Transition Metal Halides: The Unexpected Effect of Potential Cycling of Pbl₂. Chemistry - A European Journal, 2015, 21, 3073-3078.	1.7	10
398	Phase equilibria in the Znâ€“Mnâ€“O system. Journal of the European Ceramic Society, 2015, 35, 555-560.	2.8	10
399	Graphane Nanostripes. Angewandte Chemie - International Edition, 2016, 55, 13965-13969.	7.2	10
400	Multifunctional electrocatalytic hybrid carbon nanocables with highly active edges on their walls. Nanoscale, 2016, 8, 6700-6711.	2.8	10
401	Graphene/Group 5 Transition Metal Dichalcogenide Composites for Electrochemical Applications. Chemistry - A European Journal, 2017, 23, 10430-10437.	1.7	10
402	Synthesis, Composition, and Properties of Partially Oxidized Graphite Oxides. Materials, 2019, 12, 2367.	1.3	10
403	Coordination chemistry of 2D and layered gray arsenic: photochemical functionalization with chromium hexacarbonyl. NPG Asia Materials, 2019, 11, .	3.8	10
404	2H and 2H/1T-Transition Metal Dichalcogenide Films Prepared via Powderless Gas Deposition for the Hydrogen Evolution Reaction. ACS Sustainable Chemistry and Engineering, 2019, 7, 16440-16449.	3.2	10
405	Graphitic nanofibers decorated with Ni3S2 interlaced nanosheets as efficient binder-free cathodes for hybrid supercapacitors. Applied Surface Science, 2020, 505, 143828.	3.1	10
406	Improved CO2/CH4 Separation Properties of Cellulose Triacetate Mixedâ€Matrix Membranes with CeO2@GO Hybrid Fillers. Membranes, 2021, 11, 777.	1.4	10
407	Liquid-Phase Exfoliation of Magnetically and Optoelectronically Active Ruthenium Trichloride Nanosheets. ACS Nano, 2022, 16, 11315-11324.	7.3	10
408	Structure, oxygen non-stoichiometry and thermal properties of (Bi0.4Sr0.6)Sr2CoO5â€Î´. Thermochimica Acta, 2015, 600, 89-94.	1.2	9
409	Modification of MoS2 structure by means of high energy ions in connection to electrical properties and light element surface adsorption. Surfaces and Interfaces, 2019, 17, 100357.	1.5	9
410	Microcapacitors on graphene oxide and synthetic polymers prepared by microbeam lithography. Applied Surface Science, 2020, 528, 146802.	3.1	9
411	Overcoming the Challenges of Freestanding Tin Oxideâ€Based Composite Anodes to Achieve High Capacity and Increased Cycling Stability. Advanced Functional Materials, 2021, 31, 2106373.	7.8	9
412	The Role of Alkali Cation Intercalates on the Electrochemical Characteristics of Nb₂CT_X MXene for Energy Storage. Chemistry - A European Journal, 2021, 27, 13235-13241.	1.7	9
413	Integration of BiOI nanosheets into bubble-propelled micromotors for efficient water purification. FlatChem, 2021, 30, 100294.	2.8	9
414	Modified Single-Walled Carbon Nanotube Membranes for the Elimination of Antibiotics from Water. Membranes, 2021, 11, 720.	1.4	9

#	Article	IF	Citations
415	Nano-LED induced chemical reactions for structuring processes. Nanoscale Advances, 2020, 2, 5421-5427.	2.2	9
416	Multifunctional Photoelectroactive Platform for CO2 Reduction toward C2+ Productsâ”€Programmable Selectivity with a Bioinspired Polymer Coating. ACS Catalysis, 0, , 1558-1571.	5.5	9
417	InSe:Ge-doped InSe van der Waals heterostructure to enhance photogenerated carrier separation for self-powered photoelectrochemical-type photodetectors. Nanoscale, 2022, 14, 5412-5424.	2.8	9
418	Simple Bottom-Up Synthesis of Bismuthene Nanostructures with a Suitable Morphology for Competitive Performance in the Electrocatalytic Nitrogen Reduction Reaction. Inorganic Chemistry, 2022, 61, 5524-5538.	1.9	9
419	Antimony nanomaterials modified screen-printed electrodes for the voltammetric determination of metal ions. Electrochimica Acta, 2022, 425, 140690.	2.6	9
420	Investigation on the ability of heteroatom-doped graphene for biorecognition. Nanoscale, 2017, 9, 3530-3536.	2.8	8
421	The stopping power and energy straggling of light ions in graphene oxide foils. Nuclear Instruments & Methods in Physics Research B, 2017, 406, 173-178.	0.6	8
422	Laser modification of graphene oxide layers. EPJ Web of Conferences, 2018, 167, 04010.	0.1	8
423	Fluorographene and Graphane as an Excellent Platform for Enzyme Biocatalysis. Chemistry - A European Journal, 2018, 24, 16833-16839.	1.7	8
424	Flexible freestanding MoS₂-based composite paper for energy conversion and storage. Beilstein Journal of Nanotechnology, 2019, 10, 1488-1496.	1.5	8
425	Flexible Pt/Graphene Foil Containing only 6.6 wt % of Pt has a Comparable Hydrogen Evolution Reaction Performance to Platinum Metal. ACS Sustainable Chemistry and Engineering, 2019, 7, 11721-11727.	3.2	8
426	Edge vs. basal plane electrochemistry of layered pnictogens (As, Sb, Bi): Does edge always offer faster electron transfer?. Applied Materials Today, 2019, 16, 179-184.	2.3	8
427	Thiographene synthesized from fluorographene via xanthogenate with immobilized enzymes for environmental remediation. Nanoscale, 2019, 11, 10695-10701.	2.8	8
428	Fluorine saturation on thermally reduced graphene. Applied Materials Today, 2019, 15, 343-349.	2.3	8
429	Polydimethylsiloxaneâ€“graphene oxide composite improving performance by ion beam irradiation. Surface and Interface Analysis, 2020, 52, 1156-1162.	0.8	8
430	Freestanding LiFe0.2Mn0.8PO4/rGO nanocomposites as high energy density fast charging cathodes for lithium-ion batteries. Materials Today Energy, 2020, 16, 100416.	2.5	8
431	2D Germanane Derivative as a Vector for Overcoming Doxorubicin Resistance in Cancer Cells. Applied Materials Today, 2020, 20, 100697.	2.3	8
432	Lithium-Assisted Exfoliation of Palladium Thiophosphate Nanosheets for Photoelectrocatalytic Water Splitting. ACS Applied Nano Materials, 2021, 4, 441-448.	2.4	8

#	Article	IF	Citations
433	Photoelectrochemical Activity of Layered Metal Phosphorous Trichalcogenides for Water Oxidation. Advanced Materials Interfaces, 2021, 8, 2100294.	1.9	8
434	Fine-tuning the functionality of reduced graphene oxide via bipolar electrochemistry in freestanding 2D reaction layers. Carbon, 2022, 191, 439-447.	5.4	8
435	Sulfonated NbS₂-based proton-exchange membranes for vanadium redox flow batteries. Nanoscale, 2022, 14, 6152-6161.	2.8	8
436	Synthesis of Magnesium Phosphorous Trichalcogenides and Applications in Photoelectrochemical Water Splitting. Small, 2022, 18, e2200355.	5.2	8
437	Coâ€doping Graphene with B and N Heteroatoms for Application in Energy Conversion and Storage Devices. ChemNanoMat, 2022, 8, .	1.5	8
438	Potassium assisted reduction and doping of graphene oxides: towards faster electron transfer kinetics. RSC Advances, 2013, 3, 10900.	1.7	7
439	Graphane Nanostripes. Angewandte Chemie, 2016, 128, 14171-14175.	1.6	7
440	Introduction of sulfur to graphene oxide by Friedel-Crafts reaction. FlatChem, 2017, 6, 28-36.	2.8	7
441	Phase Transformation Induced Self-Healing Behavior of Al-Ag Alloy. Materials, 2018, 11, 199.	1.3	7
442	Growth and characterization of GaN:Mn layers by MOVPE. Journal of Crystal Growth, 2008, 310, 5025-5027.	0.7	6
443	Residual strain in recessed AlGaN/GaN heterostructure fieldâ€effect transistors evaluated by micro photoluminescence measurements. Physica Status Solidi C: Current Topics in Solid State Physics, 2012, 9, 911-914.	0.8	6
444	Carcinogenic Organic Residual Compounds Readsorbed on Thermally Reduced Graphene Materials are Released at Low Temperature. Chemistry - A European Journal, 2013, 19, 14446-14450.	1.7	6
445	Preparation and luminescent properties of cubic potassium-erbium fluoride nanoparticles. Journal of Fluorine Chemistry, 2013, 156, 363-366.	0.9	6
446	Phase equilibria in the Bi-Sr-Co-O system: Towards the material tailoring of thermoelectric cobaltites. Journal of the European Ceramic Society, 2015, 35, 3005-3012.	2.8	6
447	Hybrid optoelectronics based on a nanocrystal/III-N nano-LED platform. , 2016, , .		6
448	The structural and optical properties of metal ion-implanted GaN. Nuclear Instruments & Methods in Physics Research B, 2016, 371, 254-257.	0.6	6
449	Facile synthesis of magnetic Co nanofoam by lowâ€temperature thermal decomposition of Co glycerolate. Micro and Nano Letters, 2017, 12, 278-280.	0.6	6
450	Hydrogenation of Fluorographite and Fluorographene: An Easy Way to Produce Highly Hydrogenated Graphene. Chemistry - A European Journal, 2018, 24, 8350-8360.	1.7	6

#	Article	IF	Citations
451	Fluorographenes for Energy and Sensing Application: The Amount of Fluorine Matters. ACS Omega, 2018, 3, 17700-17706.	1.6	6
452	Synthesis and properties of phosphorus and sulfur co-doped graphene. New Journal of Chemistry, 2018, 42, 16093-16102.	1.4	6
453	Chemical bonding and thermodynamic properties of gallium and indium monochalcogenides. Journal of Chemical Thermodynamics, 2019, 128, 97-102.	1.0	6
454	Bipolar Electrochemistry as a Simple Synthetic Route toward Nanoscale Transition of Mo₂B₅ and W₂B₅ for Enhanced Hydrogen Evolution Reaction. ACS Sustainable Chemistry and Engineering, 0, , .	3.2	6
455	Hexagonal and Cubic Boron Nitride in Bulk and Nanosized Forms and Their Capacitive Behavior. ChemElectroChem, 2020, 7, 74-77.	1.7	6
456	Surface Energy of Black Phosphorus Alloys with Arsenic. ChemNanoMat, 2020, 6, 821-826.	1.5	6
457	Ruthenium on Alkaliâ€Exfoliated Ti₃(Al_{0.8}Sn_{0.2})C₂ MAX Phase Catalyses Reduction of 4â€Nitroaniline with Ammonia Borane. ChemCatChem, 2021, 13, 3470-3478.	1.8	6
458	Dealloying layered PdBi₂ nanoflakes to palladium hydride leads to enhanced electrocatalytic N₂ reduction. Journal of Materials Chemistry A, 2022, 10, 11904-11916.	5.2	6
459	Transition metal dichalcogenides as catalysts for the hydrogen evolution reaction: The emblematic case of â€œinertâ€•ZrSe₂ as catalyst for electrolyzers. Nano Select, 2022, 3, 1069-1081.	1.9	6
460	Heat-Up Colloidal Synthesis of Shape-Controlled Cu-Se-S Nanostructuresâ€”Role of Precursor and Surfactant Reactivity and Performance in N2 Electroreduction. Nanomaterials, 2021, 11, 3369.	1.9	6
461	PtSe₂ on a reduced graphene oxide foil for the alkaline hydrogen evolution reaction. Materials Advances, 2022, 3, 4348-4358.	2.6	6
462	In-situ doping and implantation of GaN layers with Mn. Physica Status Solidi C: Current Topics in Solid State Physics, 2009, 6, S646-S649.	0.8	5
463	Oxidized Al Film as an Insulation Layer in AlGaN/GaN Metalâ€“Oxideâ€“Semiconductor Heterostructure Field Effect Transistors. Japanese Journal of Applied Physics, 2010, 49, 046504.	0.8	5
464	Thermodynamic properties of tubular cobaltite Bi3.7Sr11.4Co8O29â˜Î´. Thermochimica Acta, 2015, 605, 22-27.	1.2	5
465	Ferromagnetic and paramagnetic magnetization of implanted GaN:Ho,Tb,Sm,Tm films. Journal of Applied Physics, 2015, 117, .	1.1	5
466	Mn doped GaN nanoparticles synthesized by rapid thermal treatment in ammonia. Materials Chemistry and Physics, 2015, 164, 108-114.	2.0	5
467	Ferromagnetism: Sulfur Doping Induces Strong Ferromagnetic Ordering in Graphene: Effect of Concentration and Substitution Mechanism (Adv. Mater. 25/2016). Advanced Materials, 2016, 28, 5139-5139.	11.1	5
468	A study of the effect of sonication time on the catalytic performance of layered WS₂ from various sources. Physical Chemistry Chemical Physics, 2017, 19, 2768-2777.	1.3	5

#	Article	IF	Citations
469	Thermal properties of graphite oxide, thermally reduced graphene and chemically reduced graphene. AIP Conference Proceedings, 2017, , .	0.3	5
470	MnPS3 shows anticancer behaviour towards lung cancer cells. FlatChem, 2019, 18, 100134.	2.8	5
471	Metallâ€Phosphorâ€Trichalkogenide (MPCh 3): von der Synthese zu aktuellen Energieanwendungen. Angewandte Chemie, 2019, 131, 9426-9438.	1.6	5
472	Layered black phosphorus as a reducing agent â€“ decoration with group 10 elements. RSC Advances, 2020, 10, 36452-36458.	1.7	5
473	Structural transition induced by niobium doping in layered titanium disulfide: The impact on electrocatalytic performance. Applied Materials Today, 2020, 19, 100555.	2.3	5
474	Self-reconstruction mediates isolated Pt tailored nanoframes for highly efficient catalysis. Journal of Materials Chemistry A, 2021, 9, 22501-22508.	5.2	5
475	Picric Acid Violet Light Assisted Photodegradation Mediated by Germanene-Based Materials. Bulletin of the Chemical Society of Japan, 2021, 94, 1695-1701.	2.0	5
476	Surface Modification by High-Energy Heavy-Ion Irradiation in Various Crystalline ZnO Facets. Physical Chemistry Chemical Physics, 2021, 23, 22673-22684.	1.3	5
477	Simultaneous microwave-assisted reduction and B/N co-doping of graphene oxide for selective recognition of VOCs. Journal of Materials Chemistry C, 2022, 10, 3307-3317.	2.7	5
478	Influence of different SiC surface treatments performed prior to Ni ohmic contacts formation. Microelectronic Engineering, 2011, 88, 553-556.	1.1	4
479	Rapid thermal synthesis of GaN nanocrystals and nanodisks. Journal of Nanoparticle Research, 2013, 15, 1.	0.8	4
480	Graphene: Oxygen-Free Highly Conductive Graphene Papers (Adv. Funct. Mater. 31/2014). Advanced Functional Materials, 2014, 24, 4877-4877.	7.8	4
481	Planar Polyolefin Nanostripes: Perhydrogenated Graphene. Chemistry - A European Journal, 2017, 23, 11961-11968.	1.7	4
482	Thermodynamic properties of misfit cobaltite [Bi2-xCa2O4][CoO2]1.7. Thermochimica Acta, 2017, 656, 129-134.	1.2	4
483	Covalent Functionalization of Exfoliated Arsenic with Chlorocarbene. Angewandte Chemie, 2018, 130, 15053-15056.	1.6	4
484	Mix-and-Read No-Wash Fluorescence DNA Sensing System Using Graphene Oxide: Analytical Performance of Fresh Versus Aged Dispersions. ACS Omega, 2019, 4, 1611-1616.	1.6	4
485	Selenium covalently modified graphene: towards gas sensing. 2D Materials, 2019, 6, 034006.	2.0	4
486	Pnictogenâ€Based Enzymatic Phenol Biosensors: Phosphorene, Arsenene, Antimonene, and Bismuthene. Angewandte Chemie, 2019, 131, 140-144.	1.6	4

#	Article	IF	Citations
487	The effectiveness of Soxhlet extraction as a simple method for GO rinsing as a precursor of high-quality graphene. Nanoscale Advances, 2021, 3, 5292-5300.	2.2	4
488	Mineralizer-free synthesis of orthorhombic arsenic-phosphorus alloys. FlatChem, 2021, 30, 100297.	2.8	4
489	Stimuli-responsive of magnetic metal-organic frameworks (MMOF): Synthesis, dispersion control, and its tunability into polymer matrix under the augmented-magnetic field for H2 separation and CO2 capturing applications. International Journal of Hydrogen Energy, 2022, 47, 20166-20175.	3.8	4
490	Molybdenum Disulfide: Lithium Intercalation Compound Dramatically Influences the Electrochemical Properties of Exfoliated MoS2 (Small 5/2015). Small, 2015, 11, 604-604.	5.2	3
491	A simplified protocol for the usage of new immuno-SERS probes for the detection of casein, collagens and ovalbumin in the cross-sections of artworks. Analytical Methods, 2018, 10, 1054-1062.	1.3	3
492	Stabilization of Black Phosphorus by Sonicationâ€Assisted Simultaneous Exfoliation and Functionalization. Chemistry - A European Journal, 2020, 26, 17581-17587.	1.7	3
493	Enhanced voltammetric performance of sensors based on oxidized 2D layered black phosphorus. Talanta, 2022, 238, 123036.	2.9	3
494	Synthesis of InN nanoparticles by rapid thermal ammonolysis. Journal of Nanoparticle Research, 2014, 16, 1.	0.8	2
495	Electrochemistry of Cd₃As₂â€"A 3D Analogue of Graphene. ChemNanoMat, 2015, 1, 359-363.	1.5	2
496	Structural and optical properties of vanadium ion-implanted GaN. Nuclear Instruments & Methods in Physics Research B, 2017, 406, 53-57.	0.6	2
497	Innentitelbild: Pnictogen (As, Sb, Bi) Nanosheets for Electrochemical Applications Are Produced by Shear Exfoliation Using Kitchen Blenders (Angew. Chem. 46/2017). Angewandte Chemie, 2017, 129, 14510-14510.	1.6	2
498	GO/2D WS2 Based Humidity Sensor. Proceedings (mdpi), 2017, 1, 469.	0.2	2
499	Supercapacitors in Motion: Autonomous Microswimmers for Naturalâ€Resource Recovery. Angewandte Chemie, 2019, 131, 13474-13478.	1.6	2
500	A Metalâ€Doped Fungiâ€Based Biomaterial for Advanced Electrocatalysis. Chemistry - A European Journal, 2019, 25, 3828-3834.	1.7	2
501	Structural Manipulation of Layered TiS₂ to TiS₃ Nanobelts through Niobium Doping for Highâ€Performance Supercapacitors. ChemElectroChem, 2020, 7, 4985-4989.	1.7	2
502	Energetic Au ion beam implantation of ZnO nanopillars for optical response modulation. Journal Physics D: Applied Physics, 2022, 55, 215101.	1.3	2
503	Photomodification of benzyl germanane with group 6 metal carbonyls. FlatChem, 2022, 33, 100354.	2.8	2
504	The multi-energetic Au ion implantation of graphene oxide and polymers. EPJ Web of Conferences, 2022, 261, 02006.	0.1	2

#	Article	IF	Citations
505	Electroactive nanocarbon materials as signaling tags for electrochemical PCR. Talanta, 2022, 245, 123479.	2.9	2
506	Synthesis, characterisation, and feasibility studies on the use of vanadium tellurate(<scp>vi</scp>) as a cathode material for aqueous rechargeable Zn-ion batteries. RSC Advances, 2022, 12, 12211-12218.	1.7	2
507	Layered selenophosphate HgPSe₃ single crystals: a new candidate for X-ray to visible light photodetectors. Journal of Materials Chemistry C, 2022, 10, 8834-8844.	2.7	2
508	Investigation of AlN growth on sapphire substrates in a horizontal MOVPE reactor. Journal of Physics and Chemistry of Solids, 2007, 68, 1131-1134.	1.9	1
509	Selective Nitrogen Functionalization of Graphene by Bucherer-Type Reaction. Chemistry - A European Journal, 2015, 21, 7969-7969.	1.7	1
510	GaN:Co epitaxial layers grown by MOVPE. Journal of Crystal Growth, 2015, 414, 62-68.	0.7	1
511	InGaN mesoscopic structures for low energy consumption nano-opto-electronics. , 2016, , .		1
512	Low-Temperature PM IRRAS of a Monolayer on Au: Spectra of C₁₈D₃₇SH. Langmuir, 2017, 33, 5613-5616.	1.6	1
513	Reprint of â€œGraphene oxide layers modified by irradiation with 1.2â€¯MeV He+ ionsâ€• Surface and Coatings Technology, 2018, 355, 301-306.	2.2	1
514	Comparison of GO and polymer microcapacitors prepared by ion beam writing. Surface and Interface Analysis, 2020, 52, 1171-1177.	0.8	1
515	Modification of structure and surface morphology in various ZnO facets via low fluence gold swift heavy ion irradiation. Surface and Interface Analysis, 2021, 53, 230-243.	0.8	1
516	A short investigation on LiMn2O4 wrapped with MWCNT as composite cathode for lithium-ion batteries. Bulletin of Materials Science, 2021, 44, 1.	0.8	1
517	Synthesis of Er-complexes for photonic applications. Journal of Physics and Chemistry of Solids, 2007, 68, 1272-1275.	1.9	0
518	Porous glass doping by Er3+ for photonics applications. Journal of Materials Science: Materials in Electronics, 2007, 18, 379-382.	1.1	0
519	Frontispiece: Iridium-Catalyst-Based Autonomous Bubble-Propelled Graphene Micromotors with Ultralow Catalyst Loading. Chemistry - A European Journal, 2014, 20, n/a-n/a.	1.7	0
520	Voltammetry of Layered Black Phosphorus: Electrochemistry of Multilayer Phosphorene. ChemElectroChem, 2015, 2, 295-295.	1.7	0
521	Frontispiece: Hydrogenated Graphenes by Birch Reduction: Influence of Electron and Proton Sources on Hydrogenation Efficiency, Magnetism, and Electrochemistry. Chemistry - A European Journal, 2015, 21, .	1.7	0
522	Highly reliable long-term operation of AlGaN/GaN/AlN HFETs grown on silver substrate. , 2016, , .		0

#	Article	IF	Citations
523	Fabrication of UV sources for novel lithographical techniques: Development of nano-LED etching procedures. , 2016, , .		0
524	Frontispiece: Chemistry of Graphene Derivatives: Synthesis, Applications, and Perspectives. Chemistry - A European Journal, 2018, 24, .	1.7	0
525	Alkali Metal Arenides as a Universal Synthetic Tool for Layered 2D Germanene Modification. Angewandte Chemie, 2019, 131, 16669-16674.	1.6	0
526	Graphene and other two-dimensional materials in electrocatalysis. , 0, , .		0
527	Microstructural modifications induced in Si⁺-implanted yttria-stabilised zirconia: a combined RBS-C, XRD and Raman investigation. Physical Chemistry Chemical Physics, 2022, 24, 6290-6301.	1.3	0
528	Arsenene and Antimonene. , 2022, , 149-172.		0
529	Electrochemical Behavior of Rechargeable Alâ€“Ni Battery Systems in Concentrated [EMIm]Cl-AlCl₃ Electrolyte. ACS Applied Energy Materials, 2022, 5, 6797-6804.	2.5	0