Humberto Terrones

List of Publications by Year
in descending order

222 papers	31,865 citations	4146 87 h-index	4015 176 g-index
229 all docs	229 docs citations	229 times ranked	30723 citing authors

#	Article	IF	Citations
1	Recent Advances in Two-Dimensional Materials beyond Graphene. ACS Nano, 2015, 9, 11509-11539.	14.6	2,069
2	Vertical and in-plane heterostructures from WS2/MoS2 monolayers. Nature Materials, 2014, 13, 1135-1142.	27.5	1,918
3	Extraordinary Room-Temperature Photoluminescence in Triangular WS₂ Monolayers. Nano Letters, 2013, 13, 3447-3454.	9.1	1,375
4	Identification of individual and few layers of WS2 using Raman Spectroscopy. Scientific Reports, 2013, 3, .	3.3	1,185
5	Graphene and graphite nanoribbons: Morphology, properties, synthesis, defects and applications. Nano Today, 2010, 5, 351-372.	11.9	817
6	Controlled production of aligned-nanotube bundles. Nature, 1997, 388, 52-55.	27.8	763
7	Defect engineering of two-dimensional transition metal dichalcogenides. 2D Materials, 2016, 3, 022002.	4.4	736
8	Identification of Electron Donor States in N-Doped Carbon Nanotubes. Nano Letters, 2001, 1, 457-460.	9.1	727
9	Bulk Production of a New Form of sp² Carbon: Crystalline Graphene Nanoribbons. Nano Letters, 2008, 8, 2773-2778.	9.1	588
10	Nitrogen-doped graphene: beyond single substitution and enhanced molecular sensing. Scientific Reports, 2012, 2, 586.	3.3	563
11	Photosensor Device Based on Fewâ€Layered WS₂ Films. Advanced Functional Materials, 2013, 23, 5511-5517.	14.9	546
12	Beyond Graphene: Progress in Novel Two-Dimensional Materials and van der Waals Solids. Annual Review of Materials Research, 2015, 45, 1-27.	9.3	537
13	Controlled Synthesis and Transfer of Large-Area WS₂ Sheets: From Single Layer to Few Layers. ACS Nano, 2013, 7, 5235-5242.	14.6	534
14	Selective Attachment of Gold Nanoparticles to Nitrogen-Doped Carbon Nanotubes. Nano Letters, 2003, 3, 275-277.	9.1	518
15	Structure and Electronic Properties ofMoS2Nanotubes. Physical Review Letters, 2000, 85, 146-149.	7.8	497
16	New Metallic Allotropes of Planar and Tubular Carbon. Physical Review Letters, 2000, 84, 1716-1719.	7.8	485
17	The role of defects and doping in 2D graphene sheets and 1D nanoribbons. Reports on Progress in Physics, 2012, 75, 062501.	20.1	475
18	Coalescence of Single-Walled Carbon Nanotubes. Science, 2000, 288, 1226-1229.	12.6	469

#	Article	IF	Citations
19	Band Gap Engineering and Layer-by-Layer Mapping of Selenium-Doped Molybdenum Disulfide. Nano Letters, 2014, 14, 442-449.	9.1	463
20	Three-dimensionally bonded spongy graphene material with super compressive elasticity and near-zero Poissonâ€™s ratio. Nature Communications, 2015, 6, 6141.	12.8	458
21	Novel hetero-layered materials with tunable direct band gaps by sandwiching different metal disulfides and diselenides. Scientific Reports, 2013, 3, 1549.	3.3	437
22	N-doping and coalescence of carbon nanotubes: synthesis and electronic properties. Applied Physics A: Materials Science and Processing, 2002, 74, 355-361.	2.3	392
23	Electronic and optical properties of strained graphene and other strained 2D materials: a review. Reports on Progress in Physics, 2017, 80, 096501.	20.1	383
24	Defect-Induced Photoluminescence in Monolayer Semiconducting Transition Metal Dichalcogenides. ACS Nano, 2015, 9, 1520-1527.	14.6	376
25	Field-Effect Transistors Based on Few-Layered Î±-MoTe₂. ACS Nano, 2014, 8, 5911-5920.	14.6	333
26	Biocompatibility and Toxicological Studies of Carbon Nanotubes Doped with Nitrogen. Nano Letters, 2006, 6, 1609-1616.	9.1	332
27	Covalently bonded three-dimensional carbon nanotube solids via boron induced nanojunctions. Scientific Reports, 2012, 2, 363.	3.3	329
28	Longitudinal Cutting of Pure and Doped Carbon Nanotubes to Form Graphitic Nanoribbons Using Metal Clusters as Nanoscalpels. Nano Letters, 2010, 10, 366-372.	9.1	323
29	Enhanced magnetic coercivities in Fe nanowires. Applied Physics Letters, 1999, 75, 3363-3365.	3.3	303
30	Spectroscopic Signatures for Interlayer Coupling in MoS₂â€“WSe₂ van der Waals Stacking. ACS Nano, 2014, 8, 9649-9656.	14.6	288
31	Metal particle catalysed production of nanoscale BN structures. Chemical Physics Letters, 1996, 259, 568-573.	2.6	282
32	Electron and phonon renormalization near charged defects in carbon nanotubes. Nature Materials, 2008, 7, 878-883.	27.5	263
33	Carbon Nitride Nanocomposites: Formation of Aligned CxNy Nanofibers. Advanced Materials, 1999, 11, 655-658.	21.0	252
34	Efficient route to large arrays of CNx nanofibers by pyrolysis of ferrocene/melamine mixtures. Applied Physics Letters, 1999, 75, 3932-3934.	3.3	242
35	Electronic Transport and Mechanical Properties of Phosphorus- and Phosphorusâ^'Nitrogen-Doped Carbon Nanotubes. ACS Nano, 2009, 3, 1913-1921.	14.6	228
36	Probing the Interlayer Coupling of Twisted Bilayer MoS₂ Using Photoluminescence Spectroscopy. Nano Letters, 2014, 14, 5500-5508.	9.1	228

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37	In situ nucleation of carbon nanotubes by the injection of carbon atoms into metal particles. Nature Nanotechnology, 2007, 2, 307-311.	31.5	226
38	Pyrolytically grown BxCyNz nanomaterials: nanofibres and nanotubes. Chemical Physics Letters, 1996, 257, 576-582.	2.6	223
39	Covalent 2D and 3D Networks from 1D Nanostructures:Â Designing New Materials. Nano Letters, 2007, 7, 570-576.	9.1	223
40	Electrolytic formation of carbon nanostructures. Chemical Physics Letters, 1996, 262, 161-166.	2.6	221
41	Nitrogen-Mediated Carbon Nanotube Growth: Diameter Reduction, Metallicity, Bundle Dispersability, and Bamboo-like Structure Formation. ACS Nano, 2007, 1, 369-375.	14.6	207
42	Excited Excitonic States in 1L, 2L, 3L, and Bulk WSe₂ Observed by Resonant Raman Spectroscopy. ACS Nano, 2014, 8, 9629-9635.	14.6	207
43	Synthesis and characterization of long strands of nitrogen-doped single-walled carbon nanotubes. Chemical Physics Letters, 2006, 424, 345-352.	2.6	198
44	CVD-grown monolayered MoS ₂ as an effective photosensor operating at low-voltage. 2D Materials, 2014, 1, 011004.	4.4	195
45	Heterodoped Nanotubes: Theory, Synthesis, and Characterization of Phosphorusâ˘'Nitrogen Doped Multiwalled Carbon Nanotubes. ACS Nano, 2008, 2, 441-448.	14.6	192
46	Fullerene Coalescence in Nanopeapods:â€‰ A Path to Novel Tubular Carbon. Nano Letters, 2003, 3, 1037-1042.	9.1	185
47	Metallic and ferromagnetic edges in molybdenum disulfide nanoribbons. Nanotechnology, 2009, 20, 325703.	2.6	185
48	Fabrication of vapor and gas sensors using films of aligned CNx nanotubes. Chemical Physics Letters, 2004, 386, 137-143.	2.6	178
49	Microstructural changes induced in â€œstacked cupâ€•carbon nanofibers by heat treatment. Carbon, 2003, 41, 1941-1947.	10.3	174
50	Curved nanostructured materials. New Journal of Physics, 2003, 5, 126-126.	2.9	170
51	Thermal stability studies of CVD-grown graphene nanoribbons: Defect annealing and loop formation. Chemical Physics Letters, 2009, 469, 177-182.	2.6	170
52	Synthetic routes to nanoscale BxCyNz architectures. Carbon, 2002, 40, 1665-1684.	10.3	164
53	Tungsten oxide tree-like structures. Chemical Physics Letters, 1999, 309, 327-334.	2.6	152
54	Hydrogen storage in nanoporous carbon materials: myth and facts. Physical Chemistry Chemical Physics, 2007, 9, 1786-1792.	2.8	151

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55	Graphitic cones in palladium catalysed carbon nanofibres. Chemical Physics Letters, 2001, 343, 241-250.	2.6	150
56	Magnetic Behavior in Zinc Oxide Zigzag Nanoribbons. Nano Letters, 2008, 8, 1562-1565.	9.1	150
57	Efficient Anchoring of Silver Nanoparticles on N-Doped Carbon Nanotubes. Small, 2006, 2, 346-350.	10.0	143
58	Enhanced Electron Field Emission in B-doped Carbon Nanotubes. Nano Letters, 2002, 2, 1191-1195.	9.1	136
59	Single-atom doping of MoS ₂ with manganese enables ultrasensitive detection of dopamine: Experimental and computational approach. Science Advances, 2020, 6, eabc4250.	10.3	136
60	Synthesis, Electronic Structure, and Raman Scattering of Phosphorus-Doped Single-Wall Carbon Nanotubes. Nano Letters, 2009, 9, 2267-2272.	9.1	134
61	Observation of magnetic edge state in graphene nanoribbons. Physical Review B, 2010, 81, .	3.2	132
62	Tellurium-Assisted Low-Temperature Synthesis of MoS₂ and WS₂ Monolayers. ACS Nano, 2015, 9, 11658-11666.	14.6	123
63	On the electronic structure of WS2 nanotubes. Solid State Communications, 2000, 114, 245-248.	1.9	120
64	Boron Nitride Nanoribbons Become Metallic. Nano Letters, 2011, 11, 3267-3273.	9.1	120
65	Boron-Mediated Growth of Long Helicity-Selected Carbon Nanotubes. Physical Review Letters, 1999, 83, 5078-5081.	7.8	119
66	Atypical Excitonâ€"Phonon Interactions in WS₂ and WSe₂ Monolayers Revealed by Resonance Raman Spectroscopy. Nano Letters, 2016, 16, 2363-2368.	9.1	118
67	Largeâ€Area Siâ€Doped Graphene: Controllable Synthesis and Enhanced Molecular Sensing. Advanced Materials, 2014, 26, 7593-7599.	21.0	116
68	Chemical Vapor Deposition Synthesis of N-, P-, and Si-Doped Single-Walled Carbon Nanotubes. ACS Nano, 2010, 4, 1696-1702.	14.6	113
69	Aligned CN[sub x] nanotubes by pyrolysis of ferrocene/C[sub 60] under NH[sub 3] atmosphere. Applied Physics Letters, 2000, 77, 1807.	3.3	112
70	Boron-doping effects in carbon nanotubes. Journal of Materials Chemistry, 2000, 10, 1425-1429.	6.7	112
71	Heterojunctions between metals and carbon nanotubes as ultimate nanocontacts. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 4591-4595.	7.1	110
72	Effects of 45-nm silver nanoparticles on coronary endothelial cells and isolated rat aortic rings. Toxicology Letters, 2009, 191, 305-313.	0.8	109

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73	Production of WS2Nanotubes. Chemistry of Materials, 2000, 12, 1190-1194.	6.7	108
74	3D Silicon oxide nanostructures: from nanoflowers to radiolaria. Journal of Materials Chemistry, 1998, 8, 1859-1864.	6.7	107
75	Two-dimensional transition metal dichalcogenides: Clusters, ribbons, sheets and more. Nano Today, 2015, 10, 559-592.	11.9	107
76	One-dimensional extended lines of divacancy defects in graphene. Nanoscale, 2011, 3, 2868.	5.6	104
77	Pentagonal rings and nitrogen excess in fullerene-based BN cages and nanotube caps. Chemical Physics Letters, 1999, 299, 359-367.	2.6	102
78	Phosphorus and phosphorusâ€“nitrogen doped carbon nanotubes for ultrasensitive and selective molecular detection. Nanoscale, 2011, 3, 1008-1013.	5.6	102
79	Metal to Insulator Quantum-Phase Transition in Few-Layered ReS₂. Nano Letters, 2015, 15, 8377-8384.	9.1	101
80	Universal <i>In Situ</i> Substitutional Doping of Transition Metal Dichalcogenides by Liquid-Phase Precursor-Assisted Synthesis. ACS Nano, 2020, 14, 4326-4335.	14.6	100
81	Novel NbS2 metallic nanotubes. Solid State Communications, 2000, 115, 635-638.	1.9	95
82	Facile synthesis of MoS2 and MoxW1-xS2 triangular monolayers. APL Materials, 2014, 2, .	5.1	93
83	Carrier lifetime enhancement in halide perovskite via remote epitaxy. Nature Communications, 2019, 10, 4145.	12.8	93
84	A Simple Route to Silicon-Based Nanostructures. Advanced Materials, 1999, 11, 844-847.	21.0	91
85	Comparison study of semi-crystalline and highly crystalline multiwalled carbon nanotubes. Applied Physics Letters, 2001, 79, 1531-1533.	3.3	91
86	Structure, transport and field-emission properties of compound nanotubes: CN x vs. BNC x (x <0.1). Applied Physics A: Materials Science and Processing, 2003, 76, 499-507.	2.3	89
87	Direct observation of the structure of gold nanoparticles by total scattering powder neutron diffraction. Chemical Physics Letters, 2004, 393, 385-388.	2.6	89
88	Generation of hollow crystalline tungsten oxide fibres. Applied Physics A: Materials Science and Processing, 2000, 70, 231-233.	2.3	83
89	An Alternative Route to Molybdenum Disulfide Nanotubes. Journal of the American Chemical Society, 2000, 122, 10155-10158.	13.7	83
90	Zipper Mechanism of Nanotube Fusion: Theory and Experiment. Physical Review Letters, 2004, 92, 075504.	7.8	78

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91	Nonlinear Behavior in the Thermopower of Doped Carbon Nanotubes Due to Strong, Localized States. Nano Letters, 2003, 3, 839-842.	9.1	77
92	An Atomistic Branching Mechanism for Carbon Nanotubes: Sulfur as the Triggering Agent. Angewandte Chemie - International Edition, 2008, 47, 2948-2953.	13.8	76
93	Coalescence of Double-Walled Carbon Nanotubes:â€‰ Formation of Novel Carbon Bicables. Nano Letters, 2004, 4, 1451-1454.	9.1	75
94	Efficient encapsulation of gaseous nitrogen inside carbon nanotubes with bamboo-like structure using aerosol thermolysis. Chemical Physics Letters, 2004, 396, 167-173.	2.6	72
95	Atomic Nanotube Welders:â€‰ Boron Interstitials Triggering Connections in Double-Walled Carbon Nanotubes. Nano Letters, 2005, 5, 1099-1105.	9.1	72
96	Quantum Transport in Graphene Nanonetworks. Nano Letters, 2011, 11, 3058-3064.	9.1	71
97	Hydroxyl-Functionalized and N-Doped Multiwalled Carbon Nanotubes Decorated with Silver Nanoparticles Preserve Cellular Function. ACS Nano, 2011, 5, 2458-2466.	14.6	71
98	A theoretical and experimental study on manipulating the structure and properties of carbon nanotubes using substitutional dopants. International Journal of Quantum Chemistry, 2009, 109, 97-118.	2.0	70
99	Beyond C60: graphite structures for the future. Chemical Society Reviews, 1995, 24, 341.	38.1	69
100	Molecular dynamics study of the dewetting of copper on graphite and graphene: Implications for nanoscale self-assembly. Physical Review E, 2011, 83, 041603.	2.1	68
101	Stable BC2N nanostructures: low-temperature production of segregated C/BN layered materials. Chemical Physics Letters, 1999, 310, 459-465.	2.6	67
102	Controlling the dimensions, reactivity and crystallinity of multiwalled carbon nanotubes using low ethanol concentrations. Chemical Physics Letters, 2008, 453, 55-61.	2.6	66
103	How to Identify Haeckelite Structures: A Theoretical Study of Their Electronic and Vibrational Properties. Nano Letters, 2004, 4, 805-810.	9.1	64
104	Hydrogen storage in spherical nanoporous carbons. Chemical Physics Letters, 2005, 403, 363-366.	2.6	63
105	Guiding Electrical Current in Nanotube Circuits Using Structural Defects: A Step Forward in Nanoelectronics. ACS Nano, 2008, 2, 2585-2591.	14.6	63
106	A novel route to aligned nanotubes and nanofibres using laser-patterned catalytic substrates. Applied Physics A: Materials Science and Processing, 2000, 70, 175-183.	2.3	62
107	Spin Polarized Conductance in Hybrid Graphene Nanoribbons Using 5âˆ'7 Defects. ACS Nano, 2009, 3, 3606-3612.	14.6	60
108	Viability Studies of Pure Carbonâ€•and Nitrogenâ€Doped Nanotubes with <i>Entamoeba histolytica</i>: From Amoebicidal to Biocompatible Structures. Small, 2007, 3, 1723-1729.	10.0	59

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109	Controlling high coercivities of ferromagnetic nanowires encapsulated in carbon nanotubes. Journal of Materials Chemistry, 2010, 20, 5906.	6.7	59
110	Strain and the optoelectronic properties of nonplanar phosphorene monolayers. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 5888-5892.	7.1	57
111	Production and State-of-the-Art Characterization of Aligned Nanotubes with Homogeneous BCxN (1â€‰â‰â€‰xâ€‰â‰â€‰5) Compositions. Advanced Materials, 2003, 15, 1899-1903.	21.0	56
112	Structure, Chirality, and Formation of Giant Icosahedral Fullerenes and Spherical Graphitic Onions. Structural Chemistry, 2002, 13, 373-384.	2.0	53
113	Metallic edges in zinc oxide nanoribbons. Chemical Physics Letters, 2007, 448, 258-263.	2.6	53
114	The Role of Sulfur in the Synthesis of Novel Carbon Morphologies: From Covalent Yâ€Junctions to Seaâ€Urchinâ€Like Structures. Advanced Functional Materials, 2009, 19, 1193-1199.	14.9	51
115	Electrochemical formation of novel nanowires and their dynamic effects. Chemical Physics Letters, 1998, 284, 177-183.	2.6	50
116	Millimeter-Long Carbon Nanotubes: Outstanding Electron-Emitting Sources. ACS Nano, 2011, 5, 5072-5077.	14.6	50
117	Multivalency-Induced Band Gap Opening at MoS₂ Edges. Chemistry of Materials, 2015, 27, 3326-3331.	6.7	50
118	The Formation of ReS2 Inorganic Fullerene-like Structures Containing Re4 Parallelogram Units and Metalâˆ’Metal Bonds. Journal of the American Chemical Society, 2002, 124, 11580-11581.	13.7	49
119	Theoretical Predictions of Freestanding Honeycomb Sheets of Cadmium Chalcogenides. Journal of Physical Chemistry C, 2014, 118, 16236-16245.	3.1	48
120	Third order nonlinear optical response exhibited by mono- and few-layers of WS 2. 2D Materials, 2016, 3, 021005.	4.4	46
121	Electrolytic Formation of Carbon-Sheathed Mixed Snâˆ’Pb Nanowires. Chemistry of Materials, 1999, 11, 1747-1751.	6.7	45
122	Large second harmonic generation in alloyed TMDs and boron nitride nanostructures. Scientific Reports, 2018, 8, 10118.	3.3	45
123	The carbon nanocosmos: novel materials for the twenty-first century. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2003, 361, 2789-2806.	3.4	44
124	Differential Response of Doped/Defective Graphene and Dopamine to Electric Fields: A Density Functional Theory Study. Journal of Physical Chemistry C, 2015, 119, 13972-13978.	3.1	44
125	Properties of One-Dimensional Molybdenum Nanowires in a Confined Environment. Nano Letters, 2009, 9, 1487-1492.	9.1	43
126	Synthesis and state of art characterization of BN bamboo-like nanotubes: Evidence of a root growth mechanism catalyzed by Fe. Chemical Physics Letters, 2005, 416, 342-348.	2.6	42

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127	Mechanical properties of hypothetical graphene foams: Giant Schwarzites. Carbon, 2016, 96, 1191-1199.	10.3	42
128	Decorating carbon nanotubes with nanostructured nickel particles via chemical methods. Chemical Physics Letters, 2006, 431, 104-109.	2.6	40
129	Structure and Electronic Properties of Edge-Functionalized Armchair Boron Nitride Nanoribbons. Journal of Physical Chemistry C, 2012, 116, 15675-15681.	3.1	40
130	Bilayers of transition metal dichalcogenides: Different stackings and heterostructures. Journal of Materials Research, 2014, 29, 373-382.	2.6	40
131	Quantitative density-functional study of nested fullerenes. Physical Review B, 1998, 57, 13339-13342.	3.2	38
132	Acid modified bambooâ€type carbon nanotubes and cupâ€stackedâ€type carbon nanofibres as adsorbent materials: cadmium removal from aqueous solution. Journal of Chemical Technology and Biotechnology, 2009, 84, 519-524.	3.2	37
133	Quasiperiodic icosahedral graphite sheets and high-genus fullereneswith nonpositive Gaussian curvature. Physical Review B, 1997, 55, 9969-9974.	3.2	36
134	Cables of BN-insulated Bâ€“Câ€“N nanotubes. Applied Physics Letters, 2003, 82, 1275-1277.	3.3	36
135	Enhanced ferromagnetism in ZnO nanoribbons and clusters passivated with sulfur. Nano Research, 2008, 1, 420-426.	10.4	36
136	Preparation of aligned multi-walled BN and B/C/N nanotubular arrays and their characterization using HRTEM, EELS and energy-filtered TEM. Physica B: Condensed Matter, 2002, 323, 60-66.	2.7	34
137	Spectroscopic Characterization of N-Doped Single-Walled Carbon Nanotube Strands: An X-ray Photoelectron Spectroscopy and Raman Study. Journal of Nanoscience and Nanotechnology, 2010, 10, 3959-3964.	0.9	34
138	Resonant Raman and Exciton Coupling in High-Quality Single Crystals of Atomically Thin Molybdenum Diselenide Grown by Vapor-Phase Chalcogenization. ACS Nano, 2018, 12, 740-750.	14.6	34
139	Theoretical characterization of several models of nanoporous carbon. New Journal of Physics, 2003, 5, 123-123.	2.9	32
140	Three-dimensional massless Dirac fermions in carbon schwarzites. Physical Review B, 2014, 90, .	3.2	32
141	Pressure-Induced Selectivity for Probing Inner Tubes in Double- and Triple-Walled Carbon Nanotubes: A Resonance Raman Study. Journal of Physical Chemistry C, 2014, 118, 8153-8158.	3.1	32
142	Microscopy Study of the Growth Process and Structural Features of Silicon Oxide Nanoflowers. Chemistry of Materials, 1999, 11, 2709-2715.	6.7	31
143	Femtosecond Laser Nanosurgery of Defects in Carbon Nanotubes. Nano Letters, 2005, 5, 1361-1365.	9.1	31
144	Nitrogenâ€Doped Graphitic Nanoribbons: Synthesis, Characterization, and Transport. Advanced Functional Materials, 2013, 23, 3755-3762.	14.9	31

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145	Bandgap Tuning in BaZrS₃ Perovskite Thin Films. ACS Applied Electronic Materials, 2021, 3, 3306-3312.	4.3	31
146	Curved graphite and its mathematical transformations. Journal of Mathematical Chemistry, 1994, 15, 143-156.	1.5	29
147	Controlling the Velocity of Jumping Nanodroplets Via Their Initial Shape and Temperature. ACS Nano, 2011, 5, 7130-7136.	14.6	29
148	Quantitative Chemistry and the Discrete Geometry of Conformal Atom-Thin Crystals. ACS Nano, 2014, 8, 1136-1146.	14.6	27
149	Beryllium doping graphene, graphene-nanoribbons, C60-fullerene, and carbon nanotubes. Carbon, 2015, 84, 317-326.	10.3	27
150	Raman and electrical transport properties of few-layered arsenic-doped black phosphorus. Nanoscale, 2019, 11, 18449-18463.	5.6	27
151	Structures, Energetics, and Electronic Properties of Layered Materials and Nanotubes of Cadmium Chalcogenides. Journal of Physical Chemistry C, 2013, 117, 25817-25825.	3.1	26
152	The two peaks Gâ€² band in carbon nanotubes. Physica Status Solidi (B): Basic Research, 2008, 245, 2197-2200.	1.5	25
153	Electron transport properties of ordered networks using carbon nanotubes. Nanotechnology, 2008, 19, 315704.	2.6	25
154	Electronic Control over Attachment and Self-Assembly of Alkyne Groups on Gold. ACS Nano, 2012, 6, 9267-9275.	14.6	25
155	Edgeâ€“Edge Interactions in Stacked Graphene Nanoplatelets. ACS Nano, 2013, 7, 2834-2841.	14.6	25
156	KCl crystallization within the space between carbon nanotube walls. Chemical Physics Letters, 2000, 317, 77-82.	2.6	24
157	Electronic, magnetic, optical, and edge-reactivity properties of semiconducting and metallic WS 2 nanoribbons. 2D Materials, 2015, 2, 015002.	4.4	24
158	Electron transport study on functionalized armchair graphene nanoribbons: DFT calculations. RSC Advances, 2016, 6, 21954-21960.	3.6	24
159	Nanocages of layered BN: Super-high-pressure nanocells for formation of solid nitrogen. Journal of Chemical Physics, 2002, 116, 8523.	3.0	23
160	Doping (10, 0)-Semiconductor Nanotubes with Nitrogen and Vacancy Defects. Materials Express, 2011, 1, 127-135.	0.5	22
161	Controlling the Optical, Electrical and Chemical Properties of Carbon Inverse Opal by Nitrogen Doping. Advanced Functional Materials, 2014, 24, 2612-2619.	14.9	22
162	Fullerenes and nanotubes with non-positive Gaussian curvature. Carbon, 1998, 36, 725-730.	10.3	21

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163	Magnetic response in finite carbon graphene sheets and nanotubes. Optical Materials, 2006, 29, 110-115.	3.6	21
164	Analysis of the molecular structure of human enamel with fluorosis using micro-Raman spectroscopy. Journal of Oral Science, 2012, 54, 93-98.	1.7	20
165	Excitonic Complexes and Emerging Interlayer Electronâ€“Phonon Coupling in BN Encapsulated Monolayer Semiconductor Alloy: WS0.6Se1.4. Nano Letters, 2019, 19, 299-307.	9.1	20
166	Synthesis of SWCNT Rings Made by Two Y Junctions and Possible Applications in Electron Interferometry. Small, 2007, 3, 1900-1905.	10.0	19
167	Nitrogenâ€“Silicon Heterodoping of Carbon Nanotubes. Journal of Physical Chemistry C, 2013, 117, 8481-8490.	3.1	19
168	Phase Modulators Based on High Mobility Ambipolar ReSe2 Field-Effect Transistors. Scientific Reports, 2018, 8, 12745.	3.3	19
169	Production and detailed characterization of bean husk-based carbon: Efficient cadmium (II) removal from aqueous solutions. Water Research, 2008, 42, 3473-3479.	11.3	18
170	Effect of impurities on the electronic and magnetic properties of zinc oxide nanostructures. Chemical Physics Letters, 2010, 492, 82-88.	2.6	18
171	Novel Nanocarbons for Adsorption. , 2012, , 3-34.		18
172	3D Nanocomposites of Covalently Interconnected Multiwalled Carbon Nanotubes with SiC with Enhanced Thermal and Electrical Properties. Advanced Functional Materials, 2015, 25, 4985-4993.	14.9	18
173	Strain dependence of second harmonic generation in transition metal dichalcogenide monolayers and the fine structure of the <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:mrow><mml:mi>C</mml:mi></mml:mrow></mml:math> exciton. Physical Review B, 2020, 101, .	3.2	18
174	Electronic properties of giant fullerenes and complex graphitic nanostructures with novel morphologies. Chemical Physics Letters, 2003, 381, 683-690.	2.6	17
175	Shape and complexity at the atomic scale: the case of layered nanomaterials. Philosophical Transactions Series A, Mathematical, Physical, and Engineering Sciences, 2004, 362, 2039-2063.	3.4	17
176	Spin Transport of Polyacetylene Chains Bridging Zigzag Graphene Nanoribbon Electrodes: A Nonequilibrium Treatment of Structural Control and Spin Filtering. Journal of Physical Chemistry C, 2013, 117, 21178-21185.	3.1	16
177	Evidence of itinerant holes for long-range magnetic order in the tungsten diselenide semiconductor with vanadium dopants. Physical Review B, 2021, 103, .	3.2	16
178	Self-assembly of Si nanostructures. Chemical Physics Letters, 2000, 322, 312-320.	2.6	15
179	Temperature- and power-dependent phonon properties of suspended continuous WS2 monolayer films. Vibrational Spectroscopy, 2016, 86, 270-276.	2.2	15
180	Experimental observation and quantum modeling of electron irradiation on single-wall carbon nanotubes. IEEE Nanotechnology Magazine, 2003, 2, 349-354.	2.0	14

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181	Anomalous Paramagnetism in Doped Carbon Nanostructures. Small, 2007, 3, 120-125.	10.0	14
182	Large Metallic Vanadium Disulfide Ultrathin Flakes for Spintronic Circuits and Quantum Computing Devices. ACS Applied Nano Materials, 2019, 2, 3684-3694.	5.0	14
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