Chuanfang Zhang

List of Publications by Year in Descending Order

Source: https://exaly.com/author-pdf/1755389/chuanfang-zhang-publications-by-year.pdf

Version: 2024-04-18

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

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

480	113,188 citations	150	333
papers		h-index	g-index
508	138,656 ext. citations	13.9	9.22
ext. papers		avg, IF	L-index

#	Paper	IF	Citations
480	Perspectives on electrochemical nitrogen fixation catalyzed by two-dimensional MXenes. <i>Materials Reports Energy</i> , 2022 , 100076		1
479	Ionically Active MXene Nanopore Actuators Small, 2022, 18, e2105857	11	1
478	Synergy of ferric vanadate and MXene for high performance Li- and Na-ion batteries. <i>Chemical Engineering Journal</i> , 2022 , 436, 135012	14.7	1
477	Deformation of and Interfacial Stress Transfer in TiC MXene-Polymer Composites <i>ACS Applied Materials & ACS Applied</i>	9.5	1
476	Guidelines for Synthesis and Processing of Chemically Stable Two-Dimensional V2CTx MXene. <i>Chemistry of Materials</i> , 2022 , 34, 499-509	9.6	11
475	Perspectives on preparation of two-dimensional MXenes. <i>Science and Technology of Advanced Materials</i> , 2021 , 22, 917-930	7.1	1
474	A flexible and fully integrated wearable pressure sensing chip system for multi-scenario applications. <i>Journal of Materials Chemistry A</i> , 2021 , 9, 26875-26884	13	4
473	A Universal Approach for Room-Temperature Printing and Coating of 2D Materials. <i>Advanced Materials</i> , 2021 , e2103660	24	2
472	Perspectives on solution processing of two-dimensional MXenes. <i>Materials Today</i> , 2021 , 48, 214-214	21.8	51
471	Mechanisms of the Planar Growth of Lithium Metal Enabled by the 2D Lattice Confinement from a Ti3C2Tx MXene Intermediate Layer. <i>Advanced Functional Materials</i> , 2021 , 31, 2010987	15.6	11
470	Modified MAX Phase Synthesis for Environmentally Stable and Highly Conductive TiC MXene. <i>ACS Nano</i> , 2021 , 15, 6420-6429	16.7	116
469	Charge Dynamics in TiO2/MXene Composites. <i>Journal of Physical Chemistry C</i> , 2021 , 125, 10473-10482	3.8	4
468	Coating Porous MXene Films with Tunable Porosity for High-Performance Solid-State Supercapacitors. <i>ChemElectroChem</i> , 2021 , 8, 1911-1917	4.3	9
467	Spectroscopic signature of negative electronic compressibility from the Ti core-level of titanium carbonitride MXene. <i>Applied Physics Reviews</i> , 2021 , 8, 021401	17.3	4
466	2D MXenes with antiviral and immunomodulatory properties: A pilot study against SARS-CoV-2. <i>Nano Today</i> , 2021 , 38, 101136	17.9	23
465	The world of two-dimensional carbides and nitrides (MXenes). Science, 2021, 372,	33.3	276
464	High Breakdown Current Density in Monolayer Nb4C3Tx MXene 2021 , 3, 1088-1094		4

(2021-2021)

463	Tailoring Ti3CNTx MXene via an acid molecular scissor. <i>Nano Energy</i> , 2021 , 85, 106007	17.1	8
462	MXene conductive binder for improving performance of sodium-ion anodes in water-in-salt electrolyte. <i>Nano Energy</i> , 2021 , 79, 105433	17.1	14
461	Ultralight Ti3C2Tx MXene foam with superior microwave absorption performance. <i>Chemical Engineering Journal</i> , 2021 , 408, 127283	14.7	41
460	Solution-Processed Ti C T MXene Antennas for Radio-Frequency Communication. <i>Advanced Materials</i> , 2021 , 33, e2003225	24	38
459	Additive-Free Aqueous MXene Inks for Thermal Inkjet Printing on Textiles. Small, 2021, 17, 2006376	11	26
458	The Broad Chromatic Range of Two-Dimensional Transition Metal Carbides. <i>Advanced Optical Materials</i> , 2021 , 9, 2001563	8.1	33
457	Microsupercapacitor with a 500 nm gap between MXene/CNT electrodes. <i>Nano Energy</i> , 2021 , 81, 105616	5 17.1	25
456	Optimizing Ion Pathway in Titanium Carbide MXene for Practical High-Rate Supercapacitor. <i>Advanced Energy Materials</i> , 2021 , 11, 2003025	21.8	59
455	Characterization of MXenes at every step, from their precursors to single flakes and assembled films. <i>Progress in Materials Science</i> , 2021 , 120, 100757	42.2	80
454	PEDOT:PSS-glued MoO3 nanowire network for all-solid-state flexible transparent supercapacitors. <i>Nanoscale Advances</i> , 2021 , 3, 3502-3512	5.1	6
453	Moderating cellular inflammation using 2-dimensional titanium carbide MXene and graphene variants. <i>Biomaterials Science</i> , 2021 , 9, 1805-1815	7.4	7
452	MXenes: An Emerging Platform for Wearable Electronics and Looking Beyond. <i>Matter</i> , 2021 , 4, 377-407	12.7	40
451	Development and Applications of MXene-Based Functional Fibers. <i>ACS Applied Materials & Amp; Interfaces</i> , 2021 , 13, 36655-36669	9.5	19
450	Etching Mechanism of Monoatomic Aluminum Layers during MXene Synthesis. <i>Chemistry of Materials</i> , 2021 , 33, 6346-6355	9.6	14
449	Probing the Pseudocapacitive Charge Storage in TiC MXene Thin Films with X-ray Reflectivity. <i>ACS Applied Materials & District Material</i>	9.5	2
448	Titanium Carbide MXene Shows an Electrochemical Anomaly in Water-in-Salt Electrolytes. <i>ACS Nano</i> , 2021 , 15, 15274-15284	16.7	18
447	Safe Synthesis of MAX and MXene: Guidelines to Reduce Risk During Synthesis. <i>Journal of Chemical Health and Safety</i> , 2021 , 28, 326-338	1.7	23
446	Ten Years of Progress in the Synthesis and Development of MXenes. <i>Advanced Materials</i> , 2021 , 33, e210	3393	91

445	Can Anions Be Inserted into MXene?. Journal of the American Chemical Society, 2021, 143, 12552-12559	16.4	19
444	TiCT MXene Flakes for Optical Control of Neuronal Electrical Activity. ACS Nano, 2021, 15, 14662-14671	16.7	10
443	Interfacial assembly of two-dimensional MXenes. <i>Journal of Energy Chemistry</i> , 2021 , 60, 417-434	12	47
442	MXene-infused bioelectronic interfaces for multiscale electrophysiology and stimulation. <i>Science Translational Medicine</i> , 2021 , 13, eabf8629	17.5	13
441	Two-Dimensional MXene Modified Electrodes for Improved Anodic Performance in Vanadium Redox Flow Batteries. <i>Journal of the Electrochemical Society</i> , 2021 , 168, 090518	3.9	1
440	Adjustable electrochemical properties of solid-solution MXenes. <i>Nano Energy</i> , 2021 , 88, 106308	17.1	18
439	Multimodal Spectroscopic Study of Surface Termination Evolution in Cr2TiC2Tx MXene. <i>Advanced Materials Interfaces</i> , 2021 , 8, 2001789	4.6	7
438	Performance improvement of MXene-based perovskite solar cells upon property transition from metallic to semiconductive by oxidation of Ti3C2Tx in air. <i>Journal of Materials Chemistry A</i> , 2021 , 9, 5010	6 ⁻¹ 3025	24
437	Electrically Conductive MXene-Coated Glass Fibers for Damage Monitoring in Fiber-Reinforced Composites. <i>Journal of Carbon Research</i> , 2020 , 6, 64	3.3	О
436	Extra lithium-ion storage capacity enabled by liquid-phase exfoliated indium selenide nanosheets conductive network. <i>Energy and Environmental Science</i> , 2020 , 13, 2124-2133	35.4	20
435	MXene-Based Fibers, Yarns, and Fabrics for Wearable Energy Storage Devices. <i>Advanced Functional Materials</i> , 2020 , 30, 2000739	15.6	68
434	2D Titanium Carbide (Ti3C2Tx) in Accommodating Intraocular Lens Design. <i>Advanced Functional Materials</i> , 2020 , 30, 2000841	15.6	9
433	MXene Materials for Designing Advanced Separation Membranes. <i>Advanced Materials</i> , 2020 , 32, e19066	59 7į	103
432	All-pseudocapacitive asymmetric MXene-carbon-conducting polymer supercapacitors. <i>Nano Energy</i> , 2020 , 75, 104971	17.1	60
431	3D Flexible, Conductive, and Recyclable TiCT MXene-Melamine Foam for High-Areal-Capacity and Long-Lifetime Alkali-Metal Anode. <i>ACS Nano</i> , 2020 , 14, 8678-8688	16.7	92
430	A gel-free TiCT-based electrode array for high-density, high-resolution surface electromyography. <i>Advanced Materials Technologies</i> , 2020 , 5, 2000325	6.8	16
429	Bath Electrospinning of Continuous and Scalable Multifunctional MXene-Infiltrated Nanoyarns. <i>Small</i> , 2020 , 16, e2002158	11	38
428	MXene Films: Scalable Manufacturing of Free-Standing, Strong Ti3C2Tx MXene Films with Outstanding Conductivity (Adv. Mater. 23/2020). <i>Advanced Materials</i> , 2020 , 32, 2070180	24	3

Toward Nanotechnology-Enabled Approaches against the COVID-19 Pandemic. ACS Nano, 2020, 14, 6383-6406290 427 Tunable electrochromic behavior of titanium-based MXenes. Nanoscale, 2020, 12, 14204-14212 426 19 7.7 Turning Trash into Treasure: Additive Free MXene Sediment Inks for Screen-Printed 425 24 117 Micro-Supercapacitors. Advanced Materials, 2020, 32, e2000716 Hydrophobic and Stable MXene-Polymer Pressure Sensors for Wearable Electronics. ACS Applied 82 424 9.5 Materials & amp; Interfaces, 2020, 12, 15362-15369 Beyond TiCT: MXenes for Electromagnetic Interference Shielding. ACS Nano, 2020, 14, 5008-5016 16.7 218 423 PhenothiazineMXene Aqueous Asymmetric Pseudocapacitors. ACS Applied Energy Materials, 2020, 18 6.1 3, 3144-3149 A Two-Dimensional Mesoporous Polypyrrole@raphene Oxide Heterostructure as a Dual-Functional Ion Redistributor for Dendrite-Free Lithium Metal Anodes. *Angewandte Chemie*, **2020**, 132, 12245-12251^{3.6} 8 421 A Two-Dimensional Mesoporous Polypyrrole-Graphene Oxide Heterostructure as a Dual-Functional 16.4 420 Ion Redistributor for Dendrite-Free Lithium Metal Anodes. Angewandte Chemie - International 69 Edition, **2020**, 59, 12147-12153 Two-Photon Absorption in Monolayer MXenes. Advanced Optical Materials, 2020, 8, 1902021 8.1 26 419 Nanocellulose-MXene Biomimetic Aerogels with Orientation-Tunable Electromagnetic Interference 418 13.6 125 Shielding Performance. Advanced Science, 2020, 7, 2000979 Tracking ion intercalation into layered Ti3C2 MXene films across length scales. Energy and 417 35.4 54 Environmental Science, 2020, 13, 2549-2558 Taking MXenes from the lab to commercial products. Chemical Engineering Journal, 2020, 401, 125786 416 14.7 70 Additive-Free MXene Liquid Crystals and Fibers. ACS Central Science, 2020, 6, 254-265 16.8 415 73 Fabrication of Ti3C2 MXene Microelectrode Arrays for In Vivo Neural Recording. Journal of 8 1.6 414 Visualized Experiments, 2020, Electrical and Elastic Properties of Individual Single-Layer Nb4C3Tx MXene Flakes. Advanced 6.4 413 53 Electronic Materials, **2020**, 6, 1901382 Electromagnetic Interference Shielding: Electromagnetic Shielding of Monolayer MXene 412 12 24 Assemblies (Adv. Mater. 9/2020). Advanced Materials, 2020, 32, 2070064 TiCT MXene-Reduced Graphene Oxide Composite Electrodes for Stretchable Supercapacitors. ACS 16.7 411 130 Nano, 2020, 14, 3576-3586 Nested hybrid nanotubes. Science, 2020, 367, 506-507 410 33.3 15

409 Ion Structure Transition Enhances Charging Dynamics in Subnanometer Pores. ACS Nano, 2020, 14, 2395-2493 29

408	Two-dimensional MXenes for lithium-sulfur batteries. <i>Informala[Materilly</i> , 2020 , 2, 613-638	23.1	130
407	Electromagnetic Shielding of Monolayer MXene Assemblies. <i>Advanced Materials</i> , 2020 , 32, e1906769	24	207
406	Scalable Synthesis of Ti3C2Tx MXene. <i>Advanced Engineering Materials</i> , 2020 , 22, 1901241	3.5	164
405	Enhancement of Ti3C2 MXene Pseudocapacitance after Urea Intercalation Studied by Soft X-ray Absorption Spectroscopy. <i>Journal of Physical Chemistry C</i> , 2020 , 124, 5079-5086	3.8	17
404	MXene Composite and Coaxial Fibers with High Stretchability and Conductivity for Wearable Strain Sensing Textiles. <i>Advanced Functional Materials</i> , 2020 , 30, 1910504	15.6	147
403	A 2D Titanium Carbide MXene Flexible Electrode for High-Efficiency Light-Emitting Diodes. <i>Advanced Materials</i> , 2020 , 32, e2000919	24	59
402	Self-assembly of hierarchical Ti3C2Tx-CNT/SiNPs resilient films for high performance lithium ion battery electrodes. <i>Electrochimica Acta</i> , 2020 , 348, 136211	6.7	20
401	Raman Spectroscopy Analysis of the Structure and Surface Chemistry of Ti3C2Tx MXene. <i>Chemistry of Materials</i> , 2020 , 32, 3480-3488	9.6	227
400	Flexible Nb4C3Tx Film with Large Interlayer Spacing for High-Performance Supercapacitors. <i>Advanced Functional Materials</i> , 2020 , 30, 2000815	15.6	38
399	Conductivity extraction of thin Ti3C2Tx MXene films over 100 GHz using capacitively coupled test-fixture. <i>Applied Physics Letters</i> , 2020 , 116, 184101	3.4	5
398	Percolation Characteristics of Conductive Additives for Capacitive Flowable (Semi-Solid) Electrodes. <i>ACS Applied Materials & Interfaces</i> , 2020 , 12, 5866-5875	9.5	16
397	Oxidation-resistant titanium carbide MXene films. <i>Journal of Materials Chemistry A</i> , 2020 , 8, 573-581	13	90
396	An Ultrafast Conducting Polymer@MXene Positive Electrode with High Volumetric Capacitance for Advanced Asymmetric Supercapacitors. <i>Small</i> , 2020 , 16, e1906851	11	98
395	Electrochemical Activation of 2D MXene-Based Hybrid for High Volumetric Mg-Ion Storage Capacitance. <i>Batteries and Supercaps</i> , 2020 , 3, 354-360	5.6	16
394	Two-Dimensional Transition Metal Carbides and Nitrides (MXenes): Synthesis, Properties, and Electrochemical Energy Storage Applications. <i>Energy and Environmental Materials</i> , 2020 , 3, 29-55	13	148
393	Proton Redox and Transport in MXene-Confined Water. <i>ACS Applied Materials & Description</i> 2020, 12, 763-770	9.5	18
392	Synthesis of MoVAlC MAX Phase and Two-Dimensional MoVC MXene with Five Atomic Layers of Transition Metals. <i>ACS Nano</i> , 2020 , 14, 204-217	16.7	198

(2020-2020)

391	Ti3C2T /PEDOT:PSS hybrid materials for room-temperature methanol sensor. <i>Chinese Chemical Letters</i> , 2020 , 31, 1018-1021	8.1	31
390	MXene-Based Dendrite-Free Potassium Metal Batteries. <i>Advanced Materials</i> , 2020 , 32, e1906739	24	130
389	MXene-Derived Bilayered Vanadium Oxides with Enhanced Stability in Li-Ion Batteries. <i>ACS Applied Energy Materials</i> , 2020 , 3, 10892-10901	6.1	8
388	Printing and coating MXenes for electrochemical energy storage devices. JPhys Energy, 2020, 2, 031004	4.9	28
387	Arrayed silk fibroin for high-performance Li metal batteries and atomic interface structure revealed by cryo-TEM. <i>Journal of Materials Chemistry A</i> , 2020 , 8, 26045-26054	13	26
386	Maximizing ion accessibility in MXene-knotted carbon nanotube composite electrodes for high-rate electrochemical energy storage. <i>Nature Communications</i> , 2020 , 11, 6160	17.4	71
385	Rational Design of Titanium Carbide MXene Electrode Architectures for Hybrid Capacitive Deionization. <i>Energy and Environmental Materials</i> , 2020 , 3, 398-404	13	13
384	Electrode materialibnic liquid coupling for electrochemical energy storage. <i>Nature Reviews Materials</i> , 2020 , 5, 787-808	73.3	89
383	Anomalous absorption of electromagnetic waves by 2D transition metal carbonitride TiCNT (MXene). <i>Science</i> , 2020 , 369, 446-450	33.3	362
382	Laser writing of the restacked titanium carbide MXene for high performance supercapacitors. <i>Energy Storage Materials</i> , 2020 , 32, 418-424	19.4	17
381	Vertically Aligned Nanopatterns of Amine-Functionalized Ti3C2 MXene via Soft Lithography. <i>Advanced Materials Interfaces</i> , 2020 , 7, 2000424	4.6	10
380	Perspectives for electrochemical capacitors and related devices. <i>Nature Materials</i> , 2020 , 19, 1151-1163	27	493
379	Enhanced Rate Capability of Ion-Accessible Ti3C2Tx-NbN Hybrid Electrodes. <i>Advanced Energy Materials</i> , 2020 , 10, 2001411	21.8	28
378	Tailoring Electronic and Optical Properties of MXenes through Forming Solid Solutions. <i>Journal of the American Chemical Society</i> , 2020 , 142, 19110-19118	16.4	58
377	Bulk and Surface Chemistry of the Niobium MAX and MXene Phases from Multinuclear Solid-State NMR Spectroscopy. <i>Journal of the American Chemical Society</i> , 2020 , 142, 18924-18935	16.4	15
376	Adsorption of Uremic Toxins Using TiCT MXene for Dialysate Regeneration. ACS Nano, 2020, 14, 11787-	11167. 9 8	35
375	Bioencapsulated MXene Flakes for Enhanced Stability and Composite Precursors. <i>Advanced Functional Materials</i> , 2020 , 30, 2004554	15.6	19
374	Scalable Manufacturing of Free-Standing, Strong Ti C T MXene Films with Outstanding Conductivity. <i>Advanced Materials</i> , 2020 , 32, e2001093	24	268

373	Enhanced Ionic Accessibility of Flexible MXene Electrodes Produced by Natural Sedimentation. <i>Nano-Micro Letters</i> , 2020 , 12, 89	19.5	30
372	Computational Screening of 2D Ordered Double Transition-Metal Carbides (MXenes) as Electrocatalysts for Hydrogen Evolution Reaction. <i>Journal of Physical Chemistry C</i> , 2020 , 124, 10584-105	<u>32</u> 8	24
371	Synthesis and electrochemical properties of 2D molybdenum vanadium carbides Bolid solution MXenes. <i>Journal of Materials Chemistry A</i> , 2020 , 8, 8957-8968	13	38
370	Surface Modification of a MXene by an Aminosilane Coupling Agent. <i>Advanced Materials Interfaces</i> , 2020 , 7, 1902008	4.6	62
369	Knittable and Washable Multifunctional MXene-Coated Cellulose Yarns. <i>Advanced Functional Materials</i> , 2019 , 29, 1905015	15.6	121
368	MXene-Bonded Flexible Hard Carbon Film as Anode for Stable Na/K-Ion Storage. <i>Advanced Functional Materials</i> , 2019 , 29, 1906282	15.6	118
367	Energy Storage Data Reporting in Perspective Luidelines for Interpreting the Performance of Electrochemical Energy Storage Systems. <i>Advanced Energy Materials</i> , 2019 , 9, 1902007	21.8	349
366	Tuning the Electrochemical Performance of Titanium Carbide MXene by Controllable In Situ Anodic Oxidation. <i>Angewandte Chemie</i> , 2019 , 131, 18013-18019	3.6	17
365	Tuning the Electrochemical Performance of Titanium Carbide MXene by Controllable In Situ Anodic Oxidation. <i>Angewandte Chemie - International Edition</i> , 2019 , 58, 17849-17855	16.4	64
364	Ultrafast Growth of Thin Hexagonal and Pyramidal Molybdenum Nitride Crystals and Films 2019 , 1, 383-	-388	7
363	A General Atomic Surface Modification Strategy for Improving Anchoring and Electrocatalysis Behavior of TiCT MXene in Lithium-Sulfur Batteries. <i>ACS Nano</i> , 2019 , 13, 11078-11086	16.7	129
362	Electrochemical Interaction of Sn-Containing MAX Phase (Nb2SnC) with Li-Ions. <i>ACS Energy Letters</i> , 2019 , 4, 2452-2457	20.1	16
361	Electrochemical Actuators Based on Two-Dimensional TiCT (MXene). <i>Nano Letters</i> , 2019 , 19, 7443-7448	11.5	53
360	Ultralight and Mechanically Robust TiCT Hybrid Aerogel Reinforced by Carbon Nanotubes for Electromagnetic Interference Shielding. <i>ACS Applied Materials & Amp; Interfaces</i> , 2019 , 11, 38046-38054	9.5	146
359	Boosting Performance of Na-S Batteries Using Sulfur-Doped TiCT MXene Nanosheets with a Strong Affinity to Sodium Polysulfides. <i>ACS Nano</i> , 2019 , 13, 11500-11509	16.7	134
358	Colloidal Gelation in Liquid Metals Enables Functional Nanocomposites of 2D Metal Carbides (MXenes) and Lightweight Metals. <i>ACS Nano</i> , 2019 , 13, 12415-12424	16.7	31
357	Nanotechnology Facets of the Periodic Table of Elements. ACS Nano, 2019, 13, 10879-10886	16.7	15
356	Ultrathin, Wrinkled, Vertically Aligned Co(OH) Nanosheets/Ag Nanowires Hybrid Network for Flexible Transparent Supercapacitor with High Performance. <i>ACS Applied Materials & Description</i> 11, 8992-9001	9.5	72

(2019-2019)

355	Carbon-Based Metal-Free Catalysts for Energy Storage and Environmental Remediation. <i>Advanced Materials</i> , 2019 , 31, e1806128	24	118
354	Magnesium-Ion Storage Capability of MXenes. ACS Applied Energy Materials, 2019, 2, 1572-1578	6.1	53
353	Control of MXenes' electronic properties through termination and intercalation. <i>Nature Communications</i> , 2019 , 10, 522	17.4	380
352	SnO2IIi3C2 MXene electron transport layers for perovskite solar cells. <i>Journal of Materials Chemistry A</i> , 2019 , 7, 5635-5642	13	111
351	Electrospun MXene/carbon nanofibers as supercapacitor electrodes. <i>Journal of Materials Chemistry A</i> , 2019 , 7, 269-277	13	272
350	The Future of Layer-by-Layer Assembly: A Tribute to ACS Nano Associate Editor Helmuth MBwald. <i>ACS Nano</i> , 2019 , 13, 6151-6169	16.7	127
349	A Robust, Freestanding MXene-Sulfur Conductive Paper for Long-Lifetime Liß Batteries. <i>Advanced Functional Materials</i> , 2019 , 29, 1901907	15.6	131
348	Revealing the Pseudo-Intercalation Charge Storage Mechanism of MXenes in Acidic Electrolyte. <i>Advanced Functional Materials</i> , 2019 , 29, 1902953	15.6	101
347	Flexible CuO nanotube arrays composite electrodes for wire-shaped supercapacitors with robust electrochemical stability. <i>Chemical Engineering Journal</i> , 2019 , 374, 181-188	14.7	29
346	High areal capacity battery electrodes enabled by segregated nanotube networks. <i>Nature Energy</i> , 2019 , 4, 560-567	62.3	153
345	Two-Dimensional Arrays of Transition Metal Nitride Nanocrystals. <i>Advanced Materials</i> , 2019 , 31, e1902	39234	59
344	On-Chip MXene Microsupercapacitors for AC-Line Filtering Applications. <i>Advanced Energy Materials</i> , 2019 , 9, 1901061	21.8	64
343	Unimpeded migration of ions in carbon electrodes with bimodal pores at an ultralow temperature of 1100 °C. <i>Journal of Materials Chemistry A</i> , 2019 , 7, 16339-16346	13	16
342	Enhanced Selectivity of MXene Gas Sensors through Metal Ion Intercalation: In Situ X-ray Diffraction Study. <i>ACS Sensors</i> , 2019 , 4, 1365-1372	9.2	84
341	Immunomodulatory nanodiamond aggregate-based platform for the treatment of rheumatoid arthritis. <i>International Journal of Energy Production and Management</i> , 2019 , 6, 163-174	5.3	14
340	Effect of Ti3AlC2 MAX Phase on Structure and Properties of Resultant Ti3C2Tx MXene. <i>ACS Applied Nano Materials</i> , 2019 , 2, 3368-3376	5.6	92
339	Additive-free MXene inks and direct printing of micro-supercapacitors. <i>Nature Communications</i> , 2019 , 10, 1795	17.4	407
338	MXene-conducting polymer electrochromic microsupercapacitors. <i>Energy Storage Materials</i> , 2019 , 20, 455-461	19.4	69

337	Anisotropic MXene Aerogels with a Mechanically Tunable Ratio of Electromagnetic Wave Reflection to Absorption. <i>Advanced Optical Materials</i> , 2019 , 7, 1900267	8.1	138
336	Scalable Synthesis of Ultrathin Mn3N2 Exhibiting Room-Temperature Antiferromagnetism. <i>Advanced Functional Materials</i> , 2019 , 29, 1809001	15.6	37
335	Scalable Manufacturing of Large and Flexible Sheets of MXene/Graphene Heterostructures. <i>Advanced Materials Technologies</i> , 2019 , 4, 1800639	6.8	60
334	Electrochromic Effect in Titanium Carbide MXene Thin Films Produced by Dip-Coating. <i>Advanced Functional Materials</i> , 2019 , 29, 1809223	15.6	80
333	Prediction of Synthesis of 2D Metal Carbides and Nitrides (MXenes) and Their Precursors with Positive and Unlabeled Machine Learning. <i>ACS Nano</i> , 2019 , 13, 3031-3041	16.7	95
332	Influences from solvents on charge storage in titanium carbide MXenes. <i>Nature Energy</i> , 2019 , 4, 241-246	862.3	229
331	Effects of Synthesis and Processing on Optoelectronic Properties of Titanium Carbonitride MXene. <i>Chemistry of Materials</i> , 2019 , 31, 2941-2951	9.6	98
330	Ionic liquid pre-intercalated MXene films for ionogel-based flexible micro-supercapacitors with high volumetric energy density. <i>Journal of Materials Chemistry A</i> , 2019 , 7, 9478-9485	13	74
329	High-Temperature Behavior and Surface Chemistry of Carbide MXenes Studied by Thermal Analysis. <i>Chemistry of Materials</i> , 2019 , 31, 3324-3332	9.6	162
328	Surface Termination Dependent Work Function and Electronic Properties of Ti3C2Tx MXene. <i>Chemistry of Materials</i> , 2019 , 31, 6590-6597	9.6	169
327	Superfast high-energy storage hybrid device composed of MXene and Chevrel-phase electrodes operated in saturated LiCl electrolyte solution. <i>Journal of Materials Chemistry A</i> , 2019 , 7, 19761-19773	13	24
326	Electrochemical Behavior of Ti C T MXene in Environmentally Friendly Methanesulfonic Acid Electrolyte. <i>ChemSusChem</i> , 2019 , 12, 4480-4486	8.3	10
325	Interfacial Assembly of Ultrathin, Functional MXene Films. <i>ACS Applied Materials & Amp; Interfaces</i> , 2019 , 11, 32320-32327	9.5	46
324	Diffusion-Induced Transient Stresses in Li-Battery Electrodes Imaged by Electrochemical Quartz Crystal Microbalance with Dissipation Monitoring and Environmental Scanning Electron Microscopy. <i>ACS Energy Letters</i> , 2019 , 4, 1907-1917	20.1	15
323	Surface-Modified Metallic Ti3C2Tx MXene as Electron Transport Layer for Planar Heterojunction Perovskite Solar Cells. <i>Advanced Functional Materials</i> , 2019 , 29, 1905694	15.6	67
322	Sculpting Liquids with Two-Dimensional Materials: The Assembly of TiCT MXene Sheets at Liquid-Liquid Interfaces. <i>ACS Nano</i> , 2019 , 13, 12385-12392	16.7	30
321	MXenes for Transparent Conductive Electrodes and Transparent Energy Storage Devices 2019 , 481-501		1
320	High capacity silicon anodes enabled by MXene viscous aqueous ink. <i>Nature Communications</i> , 2019 , 10, 849	17.4	174

(2018-2019)

·7 .	52
6.7	97
3.3	564
.8	78
1.8	164
7 . 1	50
7	37
7.8 :	153
6.7	75
.8 .	47
9.4	217
·4	133
6. ₇ :	155
·7 .	54
3	74
6.4	185
.9	34
5.6	5
	9·4 -4 -6.7 -7 -6.4

301	Mixed Ionic Liquid Improves Electrolyte Dynamics in Supercapacitors. <i>Journal of Physical Chemistry C</i> , 2018 , 122, 10476-10481	3.8	40
300	Enhanced Terahertz Shielding of MXenes with Nano-Metamaterials. <i>Advanced Optical Materials</i> , 2018 , 6, 1701076	8.1	100
299	Ultrahigh-flux and fouling-resistant membranes based on layered silver/MXene (Ti3C2Tx) nanosheets. <i>Journal of Materials Chemistry A</i> , 2018 , 6, 3522-3533	13	227
298	Porous Ti3C2Tx MXene for Ultrahigh-Rate Sodium-Ion Storage with Long Cycle Life. <i>ACS Applied Nano Materials</i> , 2018 , 1, 505-511	5.6	88
297	All Pseudocapacitive MXene-RuO2 Asymmetric Supercapacitors. <i>Advanced Energy Materials</i> , 2018 , 8, 1703043	21.8	459
296	Metallic TiCT MXene Gas Sensors with Ultrahigh Signal-to-Noise Ratio. ACS Nano, 2018, 12, 986-993	16.7	664
295	MoS2-on-MXene Heterostructures as Highly Reversible Anode Materials for Lithium-Ion Batteries. <i>Angewandte Chemie</i> , 2018 , 130, 1864-1868	3.6	56
294	MoS -on-MXene Heterostructures as Highly Reversible Anode Materials for Lithium-Ion Batteries. <i>Angewandte Chemie - International Edition</i> , 2018 , 57, 1846-1850	16.4	375
293	Tuning the Basal Plane Functionalization of Two-Dimensional Metal Carbides (MXenes) To Control Hydrogen Evolution Activity. <i>ACS Applied Energy Materials</i> , 2018 , 1, 173-180	6.1	192
292	Highly Broadband Absorber Using Plasmonic Titanium Carbide (MXene). ACS Photonics, 2018, 5, 1115-1	183	162
291	MXene molecular sieving membranes for highly efficient gas separation. <i>Nature Communications</i> , 2018 , 9, 155	17.4	530
2 90	Saturable Absorption in 2D Ti C MXene Thin Films for Passive Photonic Diodes. <i>Advanced Materials</i> , 2018 , 30, 1705714	24	213
289	Stamping of Flexible, Coplanar Micro-Supercapacitors Using MXene Inks. <i>Advanced Functional Materials</i> , 2018 , 28, 1705506	15.6	322
288	Self-Assembly of Transition Metal Oxide Nanostructures on MXene Nanosheets for Fast and Stable Lithium Storage. <i>Advanced Materials</i> , 2018 , 30, e1707334	24	324
287	2D Titanium Carbide/Reduced Graphene Oxide Heterostructures for Supercapacitor Applications. <i>Batteries and Supercaps</i> , 2018 , 1, 33-38	5.6	52
286	Selective Etching of Silicon from Ti3SiC2 (MAX) To Obtain 2D Titanium Carbide (MXene). Angewandte Chemie, 2018 , 130, 5542-5546	3.6	56
285	Size-Dependent Physical and Electrochemical Properties of Two-Dimensional MXene Flakes. <i>ACS Applied Materials & Discourse Materials</i>	9.5	150
284	Moving ions confined between graphene sheets. <i>Nature Nanotechnology</i> , 2018 , 13, 625-627	28.7	15

283	Graphene-Based Materials for the Fast Removal of Cytokines from Blood Plasma <i>ACS Applied Bio Materials</i> , 2018 , 1, 436-443	4.1	14
282	Adsorption of Bovine Serum Albumin on Carbon-Based Materials. <i>Journal of Carbon Research</i> , 2018 , 4, 3	3.3	21
281	High-Performance Biscrolled MXene/Carbon Nanotube Yarn Supercapacitors. <i>Small</i> , 2018 , 14, e180222	2511	114
280	Vertically aligned MoS2 on Ti3C2 (MXene) as an improved HER catalyst. <i>Journal of Materials Chemistry A</i> , 2018 , 6, 16882-16889	13	89
279	Direct Correlation of MXene Surface Chemistry and Electronic Properties. <i>Microscopy and Microanalysis</i> , 2018 , 24, 1606-1607	0.5	5
278	Elastic properties of 2D TiCT MXene monolayers and bilayers. <i>Science Advances</i> , 2018 , 4, eaat0491	14.3	380
277	Tuning Noncollinear Spin Structure and Anisotropy in Ferromagnetic Nitride MXenes. <i>ACS Nano</i> , 2018 , 12, 6319-6325	16.7	73
276	MXene-Bonded Activated Carbon as a Flexible Electrode for High-Performance Supercapacitors. <i>ACS Energy Letters</i> , 2018 , 3, 1597-1603	20.1	265
275	In situ atomistic insight into the growth mechanisms of single layer 2D transition metal carbides. <i>Nature Communications</i> , 2018 , 9, 2266	17.4	89
274	Direct Assessment of Nanoconfined Water in 2D TiC Electrode Interspaces by a Surface Acoustic Technique. <i>Journal of the American Chemical Society</i> , 2018 , 140, 8910-8917	16.4	66
273	Inkjet Printing of Self-Assembled 2D Titanium Carbide and Protein Electrodes for Stimuli-Responsive Electromagnetic Shielding. <i>Advanced Functional Materials</i> , 2018 , 28, 1801972	15.6	111
272	Asymmetric Flexible MXene-Reduced Graphene Oxide Micro-Supercapacitor. <i>Advanced Electronic Materials</i> , 2018 , 4, 1700339	6.4	244
271	Metallic MXenes: A new family of materials for flexible triboelectric nanogenerators. <i>Nano Energy</i> , 2018 , 44, 103-110	17.1	178
270	Topochemical synthesis of 2D materials. <i>Chemical Society Reviews</i> , 2018 , 47, 8744-8765	58.5	142
269	Electronic and Optical Properties of 2D Transition Metal Carbides and Nitrides (MXenes). <i>Advanced Materials</i> , 2018 , 30, e1804779	24	464
268	Humidity Exposure Enhances Microscopic Mobility in a Room-Temperature Ionic Liquid in MXene. <i>Journal of Physical Chemistry C</i> , 2018 , 122, 27561-27566	3.8	11
267	Single platinum atoms immobilized on an MXene as an efficient catalyst for the hydrogen evolution reaction. <i>Nature Catalysis</i> , 2018 , 1, 985-992	36.5	739
266	Automated Scalpel Patterning of Solution Processed Thin Films for Fabrication of Transparent MXene Microsupercapacitors. <i>Small</i> , 2018 , 14, e1802864	11	62

265	Titanium Carbide (MXene) as a Current Collector for Lithium-Ion Batteries. ACS Omega, 2018, 3, 12489-1	13.494	41
264	MXene Sorbents for Removal of Urea from Dialysate: A Step toward the Wearable Artificial Kidney. <i>ACS Nano</i> , 2018 , 12, 10518-10528	16.7	102
263	2D titanium carbide (MXene) for wireless communication. <i>Science Advances</i> , 2018 , 4, eaau0920	14.3	219
262	Thermally Reduced Graphene/MXene Film for Enhanced Li-ion Storage. <i>Chemistry - A European Journal</i> , 2018 , 24, 18556-18563	4.8	43
261	Perfusion double-channel micropipette probes for oxygen flux mapping with single-cell resolution. Beilstein Journal of Nanotechnology, 2018 , 9, 850-860	3	1
260	Layer-by-Layer Assembly of Cross-Functional Semi-transparent MXene-Carbon Nanotubes Composite Films for Next-Generation Electromagnetic Interference Shielding. <i>Advanced Functional Materials</i> , 2018 , 28, 1803360	15.6	270
259	Two-Dimensional TiC MXene for High-Resolution Neural Interfaces. ACS Nano, 2018, 12, 10419-10429	16.7	82
258	Effect of Synthesis on Performance of MXene/Iron Oxide Anode Material for Lithium-Ion Batteries. <i>Langmuir</i> , 2018 , 34, 11325-11334	4	34
257	Antimicrobial Properties of 2D MnO and MoS Nanomaterials Vertically Aligned on Graphene Materials and TiC MXene. <i>Langmuir</i> , 2018 , 34, 7192-7200	4	86
256	Screen-printable microscale hybrid device based on MXene and layered double hydroxide electrodes for powering force sensors. <i>Nano Energy</i> , 2018 , 50, 479-488	17.1	121
255	Thickness-independent capacitance of vertically aligned liquid-crystalline MXenes. <i>Nature</i> , 2018 , 557, 409-412	50.4	627
254	In Situ Formed Protective Barrier Enabled by Sulfur@Titanium Carbide (MXene) Ink for Achieving High-Capacity, Long Lifetime Li-S Batteries. <i>Advanced Science</i> , 2018 , 5, 1800502	13.6	147
253	Cold Sintered Ceramic Nanocomposites of 2D MXene and Zinc Oxide. <i>Advanced Materials</i> , 2018 , 30, e18	0 11∕846	104
252	Two-Dimensional Titanium Carbide MXene As a Cathode Material for Hybrid Magnesium/Lithium-Ion Batteries. <i>ACS Applied Materials & District Materials & Distr</i>	9.5	149
251	Salt-Templated Synthesis of 2D Metallic MoN and Other Nitrides. ACS Nano, 2017, 11, 2180-2186	16.7	246
250	2D metal carbides and nitrides (MXenes) for energy storage. <i>Nature Reviews Materials</i> , 2017 , 2,	73.3	3469
249	Dispersions of Two-Dimensional Titanium Carbide MXene in Organic Solvents. <i>Chemistry of Materials</i> , 2017 , 29, 1632-1640	9.6	421
248	Interaction of Polar and Nonpolar Polyfluorenes with Layers of Two-Dimensional Titanium Carbide (MXene): Intercalation and Pseudocapacitance. <i>Chemistry of Materials</i> , 2017 , 29, 2731-2738	9.6	128

(2017-2017)

247	Direct observation of active material interactions in flowable electrodes using X-ray tomography. <i>Faraday Discussions</i> , 2017 , 199, 511-524	3.6	38
246	Synergetic effects of K and Mg ion intercalation on the electrochemical and actuation properties of the two-dimensional TiC MXene. <i>Faraday Discussions</i> , 2017 , 199, 393-403	3.6	50
245	Recent Developments and Prospects of Nanostructured Supercapacitors 2017, 391-404		2
244	Charge transfer induced polymerization of EDOT confined between 2D titanium carbide layers. Journal of Materials Chemistry A, 2017 , 5, 5260-5265	13	107
243	Li-ion uptake and increase in interlayer spacing of Nb4C3 MXene. Energy Storage Materials, 2017, 8, 42-	48 9.4	120
242	High and Stable Ionic Conductivity in 2D Nanofluidic Ion Channels between Boron Nitride Layers. Journal of the American Chemical Society, 2017 , 139, 6314-6320	16.4	127
241	In Situ Monitoring of Gravimetric and Viscoelastic Changes in 2D Intercalation Electrodes. <i>ACS Energy Letters</i> , 2017 , 2, 1407-1415	20.1	48
240	The role of ceramic and glass science research in meeting societal challenges: Report from an NSF-sponsored workshop. <i>Journal of the American Ceramic Society</i> , 2017 , 100, 1777-1803	3.8	17
239	Oxidation Stability of Colloidal Two-Dimensional Titanium Carbides (MXenes). <i>Chemistry of Materials</i> , 2017 , 29, 4848-4856	9.6	652
238	Efficient Antibacterial Membrane based on Two-Dimensional TiCT (MXene) Nanosheets. <i>Scientific Reports</i> , 2017 , 7, 1598	4.9	184
237	Laminated and Two-Dimensional Carbon-Supported Microwave Absorbers Derived from MXenes. <i>ACS Applied Materials & Derived From MXenes</i> . 2017 , 9, 20038-20045	9.5	229
236	Designing Pseudocapacitance for NbO/Carbide-Derived Carbon Electrodes and Hybrid Devices. <i>Langmuir</i> , 2017 , 33, 9407-9415	4	56
235	Tunable Magnetism and Transport Properties in Nitride MXenes. ACS Nano, 2017, 11, 7648-7655	16.7	190
234	Two-dimensional heterostructures for energy storage. <i>Nature Energy</i> , 2017 , 2,	62.3	552
233	Environmental Friendly Scalable Production of Colloidal 2D Titanium Carbonitride MXene with Minimized Nanosheets Restacking for Excellent Cycle Life Lithium-Ion Batteries. <i>Electrochimica Acta</i> , 2017 , 235, 690-699	6.7	129
232	Engineering Ultrathin Polyaniline in Micro/Mesoporous Carbon Supercapacitor Electrodes Using Oxidative Chemical Vapor Deposition. <i>Advanced Materials Interfaces</i> , 2017 , 4, 1601201	4.6	57
231	Diverse Applications of Nanomedicine. ACS Nano, 2017, 11, 2313-2381	16.7	714
230	High-Throughput Survey of Ordering Configurations in MXene Alloys Across Compositions and Temperatures. <i>ACS Nano</i> , 2017 , 11, 4407-4418	16.7	97

229	Rational Design of Two-Dimensional Metallic and Semiconducting Spintronic Materials Based on Ordered Double-Transition-Metal MXenes. <i>Journal of Physical Chemistry Letters</i> , 2017 , 8, 422-428	6.4	115
228	Solvent Polarity Governs Ion Interactions and Transport in a Solvated Room-Temperature Ionic Liquid. <i>Journal of Physical Chemistry Letters</i> , 2017 , 8, 167-171	6.4	35
227	2D Materials: Metallic MXene Saturable Absorber for Femtosecond Mode-Locked Lasers (Adv. Mater. 40/2017). <i>Advanced Materials</i> , 2017 , 29,	24	1
226	First-Principles Calculations of Ti2N and Ti2NT2 (T = O, F, OH) Monolayers as Potential Anode Materials for Lithium-Ion Batteries and Beyond. <i>Journal of Physical Chemistry C</i> , 2017 , 121, 13025-13034	3.8	99
225	Guidelines for Synthesis and Processing of Two-Dimensional Titanium Carbide (Ti3C2Tx MXene). <i>Chemistry of Materials</i> , 2017 , 29, 7633-7644	9.6	1689
224	Two-Dimensional Titanium Carbide (MXene) as Surface-Enhanced Raman Scattering Substrate. Journal of Physical Chemistry C, 2017 , 121, 19983-19988	3.8	179
223	2D metal carbides (MXenes) in fibers. <i>Materials Today</i> , 2017 , 20, 481-482	21.8	20
222	Nanodiamonds suppress the growth of lithium dendrites. <i>Nature Communications</i> , 2017 , 8, 336	17.4	257
221	Hollow MXene Spheres and 3D Macroporous MXene Frameworks for Na-Ion Storage. <i>Advanced Materials</i> , 2017 , 29, 1702410	24	465
220	Flexible MXenegraphene electrodes with high volumetric capacitance for integrated co-cathode energy conversion/storage devices. <i>Journal of Materials Chemistry A</i> , 2017 , 5, 17442-17451	13	150
219	Transparent, Flexible, and Conductive 2D Titanium Carbide (MXene) Films with High Volumetric Capacitance. <i>Advanced Materials</i> , 2017 , 29, 1702678	24	538
218	Metallic MXene Saturable Absorber for Femtosecond Mode-Locked Lasers. <i>Advanced Materials</i> , 2017 , 29, 1702496	24	295
217	Na-Ion Intercalation and Charge Storage Mechanism in 2D Vanadium Carbide. <i>Advanced Energy Materials</i> , 2017 , 7, 1700959	21.8	113
216	Enabling Flexible Heterostructures for Li-Ion Battery Anodes Based on Nanotube and Liquid-Phase Exfoliated 2D Gallium Chalcogenide Nanosheet Colloidal Solutions. <i>Small</i> , 2017 , 13, 1701677	11	57
215	Enabling high-rate electrochemical flow capacitors based on mesoporous carbon microspheres suspension electrodes. <i>Journal of Power Sources</i> , 2017 , 364, 182-190	8.9	16
214	Atomic Defects and Edge Structure in Single-layer Ti3C2Tx MXene. <i>Microscopy and Microanalysis</i> , 2017 , 23, 1704-1705	0.5	6
213	Selective Charging Behavior in an Ionic Mixture Electrolyte-Supercapacitor System for Higher Energy and Power. <i>Journal of the American Chemical Society</i> , 2017 , 139, 18681-18687	16.4	76
212	BN Nanosheet/Polymer Films with Highly Anisotropic Thermal Conductivity for Thermal Management Applications. <i>ACS Applied Materials & Amp; Interfaces</i> , 2017 , 9, 43163-43170	9.5	145

(2016-2017)

211	Investigation of chloride ion adsorption onto Ti2C MXene monolayers by first-principles calculations. <i>Journal of Materials Chemistry A</i> , 2017 , 5, 24720-24727	13	40
21 0	2D molybdenum and vanadium nitrides synthesized by ammoniation of 2D transition metal carbides (MXenes). <i>Nanoscale</i> , 2017 , 9, 17722-17730	7.7	192
209	Selective Molecular Separation on TiCT-Graphene Oxide Membranes during Pressure-Driven Filtration: Comparison with Graphene Oxide and MXenes. <i>ACS Applied Materials & Comparison amp; Interfaces</i> , 2017 , 9, 44687-44694	9.5	116
208	Ultra-high-rate pseudocapacitive energy storage in two-dimensional transition metal carbides. <i>Nature Energy</i> , 2017 , 2,	62.3	1071
207	Thermoelectric Properties of Two-Dimensional Molybdenum-Based MXenes. <i>Chemistry of Materials</i> , 2017 , 29, 6472-6479	9.6	163
206	Flexible MXene/Graphene Films for Ultrafast Supercapacitors with Outstanding Volumetric Capacitance. <i>Advanced Functional Materials</i> , 2017 , 27, 1701264	15.6	934
205	An Atomistic Carbide-Derived Carbon Model Generated Using ReaxFF-Based Quenched Molecular Dynamics. <i>Journal of Carbon Research</i> , 2017 , 3, 32	3.3	9
204	Evidence of molecular hydrogen trapped in two-dimensional layered titanium carbide-based MXene. <i>Physical Review Materials</i> , 2017 , 1,	3.2	13
203	Influence of humidity on performance and microscopic dynamics of an ionic liquid in supercapacitor. <i>Physical Review Materials</i> , 2017 , 1,	3.2	12
202	Influence of metal ions intercalation on the vibrational dynamics of water confined between MXene layers. <i>Physical Review Materials</i> , 2017 , 1,	3.2	35
201	Highly flexible and transparent solid-state supercapacitors based on RuO2/PEDOT:PSS conductive ultrathin films. <i>Nano Energy</i> , 2016 , 28, 495-505	17.1	197
200	Solution-processed titanium carbide MXene films examined as highly transparent conductors. <i>Nanoscale</i> , 2016 , 8, 16371-16378	7.7	165
199	Calorimetric Determination of Thermodynamic Stability of MAX and MXene Phases. <i>Journal of Physical Chemistry C</i> , 2016 , 120, 28131-28137	3.8	28
198	Ti3C2Tx (MXene) polyacrylamide nanocomposite films. <i>RSC Advances</i> , 2016 , 6, 72069-72073	3.7	112
197	Multidimensional materials and device architectures for future hybrid energy storage. <i>Nature Communications</i> , 2016 , 7, 12647	17.4	992
196	Electrochemical in Situ Tracking of Volumetric Changes in Two-Dimensional Metal Carbides (MXenes) in Ionic Liquids. <i>ACS Applied Materials & Samp; Interfaces</i> , 2016 , 8, 32089-32093	9.5	60
195	Nanoarchitectured Nb2O5 hollow, Nb2O5@carbon and NbO2@carbon Core-Shell Microspheres for Ultrahigh-Rate Intercalation Pseudocapacitors. <i>Scientific Reports</i> , 2016 , 6, 21177	4.9	97
194	Scalable salt-templated synthesis of two-dimensional transition metal oxides. <i>Nature Communications</i> , 2016 , 7, 11296	17.4	300

193	2D titanium carbide and transition metal oxides hybrid electrodes for Li-ion storage. <i>Nano Energy</i> , 2016 , 30, 603-613	17.1	229
192	One-step Solution Processing of Ag, Au and Pd@MXene Hybrids for SERS. <i>Scientific Reports</i> , 2016 , 6, 32049	4.9	200
191	Effect of Synthesis on Quality, Electronic Properties and Environmental Stability of Individual Monolayer Ti3C2 MXene Flakes. <i>Advanced Electronic Materials</i> , 2016 , 2, 1600255	6.4	649
190	Demonstration of Li-lon Capacity of MAX Phases. ACS Energy Letters, 2016, 1, 1094-1099	20.1	37
189	Layered Orthorhombic Nb2O5@Nb4C3Tx and TiO2@Ti3C2Tx Hierarchical Composites for High Performance Li-ion Batteries. <i>Advanced Functional Materials</i> , 2016 , 26, 4143-4151	15.6	244
188	Nanoscale Elastic Changes in 2D Ti3C2Tx (MXene) Pseudocapacitive Electrodes. <i>Advanced Energy Materials</i> , 2016 , 6, 1502290	21.8	92
187	Two-Dimensional Nb-Based M4C3 Solid Solutions (MXenes). <i>Journal of the American Ceramic Society</i> , 2016 , 99, 660-666	3.8	153
186	Porous heterostructured MXene/carbon nanotube composite paper with high volumetric capacity for sodium-based energy storage devices. <i>Nano Energy</i> , 2016 , 26, 513-523	17.1	505
185	Nitrogen-enriched meso-macroporous carbon fiber network as a binder-free flexible electrode for supercapacitors. <i>Carbon</i> , 2016 , 107, 629-637	10.4	113
184	Anodized Ti3SiC2 As an Anode Material for Li-ion Microbatteries. <i>ACS Applied Materials & Amp; Interfaces</i> , 2016 , 8, 16670-6	9.5	28
183	NMR reveals the surface functionalisation of Ti3C2 MXene. <i>Physical Chemistry Chemical Physics</i> , 2016 , 18, 5099-102	3.6	491
182	Layered carbide-derived carbon with hierarchically porous structure for high rate lithium-sulfur batteries. <i>Electrochimica Acta</i> , 2016 , 188, 385-392	6.7	43
181	Resolving the Structure of Ti3C2Tx MXenes through Multilevel Structural Modeling of the Atomic Pair Distribution Function. <i>Chemistry of Materials</i> , 2016 , 28, 349-359	9.6	267
180	X-ray photoelectron spectroscopy of select multi-layered transition metal carbides (MXenes). <i>Applied Surface Science</i> , 2016 , 362, 406-417	6.7	834
179	Effect of Metal Ion Intercalation on the Structure of MXene and Water Dynamics on its Internal Surfaces. <i>ACS Applied Materials & Acs Acs Applied Materials & Acs Acs Applied Materials & Acs Acs Acc Acs Acc Acc Acc Acc Acc Acc</i>	9.5	164
178	The adsorption of tetracycline and vancomycin onto nanodiamond with controlled release. <i>Journal of Colloid and Interface Science</i> , 2016 , 468, 253-261	9.3	64
177	Antibacterial Activity of Till X MXene. ACS Nano, 2016, 10, 3674-84	16.7	555
176	Control of electronic properties of 2D carbides (MXenes) by manipulating their transition metal layers. <i>Nanoscale Horizons</i> , 2016 , 1, 227-234	10.8	242

(2016-2016)

175	A Commercial Conducting Polymer as Both Binder and Conductive Additive for Silicon Nanoparticle-Based Lithium-Ion Battery Negative Electrodes. <i>ACS Nano</i> , 2016 , 10, 3702-13	16.7	320
174	H2O2 assisted room temperature oxidation of Ti2C MXene for Li-ion battery anodes. <i>Nanoscale</i> , 2016 , 8, 7580-7	7.7	287
173	Capacitance of two-dimensional titanium carbide (MXene) and MXene/carbon nanotube composites in organic electrolytes. <i>Journal of Power Sources</i> , 2016 , 306, 510-515	8.9	182
172	Synthesis of Two-Dimensional Materials for Capacitive Energy Storage. <i>Advanced Materials</i> , 2016 , 28, 6104-35	24	441
171	Synthesis and Characterization of 2D Molybdenum Carbide (MXene). <i>Advanced Functional Materials</i> , 2016 , 26, 3118-3127	15.6	640
170	Fabrication of Ti3C2Tx MXene Transparent Thin Films with Tunable Optoelectronic Properties. <i>Advanced Electronic Materials</i> , 2016 , 2, 1600050	6.4	407
169	MoS2 Nanosheets Vertically Aligned on Carbon Paper: A Freestanding Electrode for Highly Reversible Sodium-Ion Batteries. <i>Advanced Energy Materials</i> , 2016 , 6, 1502161	21.8	402
168	Highly Conductive Optical Quality Solution-Processed Films of 2D Titanium Carbide. <i>Advanced Functional Materials</i> , 2016 , 26, 4162-4168	15.6	470
167	Pseudocapacitive Electrodes Produced by Oxidant-Free Polymerization of Pyrrole between the Layers of 2D Titanium Carbide (MXene). <i>Advanced Materials</i> , 2016 , 28, 1517-22	24	614
166	Porous Two-Dimensional Transition Metal Carbide (MXene) Flakes for High-Performance Li-Ion Storage. <i>ChemElectroChem</i> , 2016 , 3, 689-693	4.3	298
165	Effects of Applied Potential and Water Intercalation on the Surface Chemistry of Ti2C and Mo2C MXenes. <i>Journal of Physical Chemistry C</i> , 2016 , 120, 28432-28440	3.8	80
164	MXene Materials: Effect of Synthesis on Quality, Electronic Properties and Environmental Stability of Individual Monolayer Ti3C2 MXene Flakes (Adv. Electron. Mater. 12/2016). <i>Advanced Electronic Materials</i> , 2016 , 2,	6.4	9
163	Synthesis and Charge Storage Properties of Hierarchical Niobium Pentoxide/Carbon/Niobium Carbide (MXene) Hybrid Materials. <i>Chemistry of Materials</i> , 2016 , 28, 3937-3943	9.6	172
162	Synthesis of two-dimensional titanium nitride Ti4N3 (MXene). <i>Nanoscale</i> , 2016 , 8, 11385-91	7.7	487
161	Influence of Surface Oxidation on Ion Dynamics and Capacitance in Porous and Nonporous Carbon Electrodes. <i>Journal of Physical Chemistry C</i> , 2016 , 120, 8730-8741	3.8	34
160	Pseudocapacitance and excellent cyclability of 2,5-dimethoxy-1,4-benzoquinone on graphene. <i>Energy and Environmental Science</i> , 2016 , 9, 2586-2594	35.4	101
159	Ion-Exchange and Cation Solvation Reactions in Ti3C2 MXene. Chemistry of Materials, 2016, 28, 3507-35	19 16	361
158	Ethanol reduced molybdenum trioxide for Li-ion capacitors. <i>Nano Energy</i> , 2016 , 26, 100-107	17.1	60

157	MXene-on-Paper Coplanar Microsupercapacitors. Advanced Energy Materials, 2016, 6, 1601372	21.8	269
156	Atomic Defects in Monolayer Titanium Carbide (TiCT) MXene. ACS Nano, 2016, 10, 9193-9200	16.7	465
155	Electromagnetic interference shielding with 2D transition metal carbides (MXenes). <i>Science</i> , 2016 , 353, 1137-40	33.3	2432
154	Nano Day: Celebrating the Next Decade of Nanoscience and Nanotechnology. <i>ACS Nano</i> , 2016 , 10, 9093	-£1.93	56
153	All-MXene (2D titanium carbide) solid-state microsupercapacitors for on-chip energy storage. <i>Energy and Environmental Science</i> , 2016 , 9, 2847-2854	35.4	428
152	Two-Dimensional Molybdenum Carbide (MXene) as an Efficient Electrocatalyst for Hydrogen Evolution. <i>ACS Energy Letters</i> , 2016 , 1, 589-594	20.1	752
151	Synthesis of carbon/sulfur nanolaminates by electrochemical extraction of titanium from TiBC. <i>Angewandte Chemie - International Edition</i> , 2015 , 54, 4810-4	16.4	81
150	Two-Dimensional, Ordered, Double Transition Metals Carbides (MXenes). ACS Nano, 2015, 9, 9507-16	16.7	923
149	Intercalation of cations into partially reduced molybdenum oxide for high-rate pseudocapacitors. <i>Energy Storage Materials</i> , 2015 , 1, 1-8	19.4	80
148	Amine-Assisted Delamination of Nb2C MXene for Li-Ion Energy Storage Devices. <i>Advanced Materials</i> , 2015 , 27, 3501-6	24	555
147	Synthesis of Carbon/Sulfur Nanolaminates by Electrochemical Extraction of Titanium from Ti2SC. <i>Angewandte Chemie</i> , 2015 , 127, 4892-4896	3.6	19
146	Formulation of ionic-liquid electrolyte to expand the voltage window of supercapacitors. <i>Angewandte Chemie - International Edition</i> , 2015 , 54, 4806-9	16.4	188
145	High mass loading, binder-free MXene anodes for high areal capacity Li-ion batteries. <i>Electrochimica Acta</i> , 2015 , 163, 246-251	6.7	169
144	New Insights into the Structure of Nanoporous Carbons from NMR, Raman, and Pair Distribution Function Analysis. <i>Chemistry of Materials</i> , 2015 , 27, 6848-6857	9.6	68
143	Free-Standing T-NbD/Graphene Composite Papers with Ultrahigh Gravimetric/Volumetric Capacitance for Li-Ion Intercalation Pseudocapacitor. <i>ACS Nano</i> , 2015 , 9, 11200-8	16.7	309
142	Charge- and Size-Selective Ion Sieving Through Ti3C2Tx MXene Membranes. <i>Journal of Physical Chemistry Letters</i> , 2015 , 6, 4026-31	6.4	515
141	Chemical vapour deposition: Transition metal carbides go 2D. <i>Nature Materials</i> , 2015 , 14, 1079-80	27	213
140	Boron nitride colloidal solutions, ultralight aerogels and freestanding membranes through one-step exfoliation and functionalization. <i>Nature Communications</i> , 2015 , 6, 8849	17.4	486

(2015-2015)

139	Natural Fiber Welded Electrode Yarns for Knittable Textile Supercapacitors. <i>Advanced Energy Materials</i> , 2015 , 5, 1401286	21.8	126
138	Flexible MXene/carbon nanotube composite paper with high volumetric capacitance. <i>Advanced Materials</i> , 2015 , 27, 339-45	24	860
137	Enhanced electrochemical performances of mesoporous carbon microsphere/selenium composites by controlling the pore structure and nitrogen doping. <i>Electrochimica Acta</i> , 2015 , 153, 140-148	6.7	41
136	Synthesis of two-dimensional materials by selective extraction. <i>Accounts of Chemical Research</i> , 2015 , 48, 128-35	24.3	456
135	Foldable supercapacitors from triple networks of macroporous cellulose fibers, single-walled carbon nanotubes and polyaniline nanoribbons. <i>Nano Energy</i> , 2015 , 11, 568-578	17.1	158
134	Al-doped EMnO2 for high mass-loading pseudocapacitor with excellent cycling stability. <i>Nano Energy</i> , 2015 , 11, 226-234	17.1	157
133	Synthesis and electrochemical properties of niobium pentoxide deposited on layered carbide-derived carbon. <i>Journal of Power Sources</i> , 2015 , 274, 121-129	8.9	64
132	Solving the Capacitive Paradox of 2D MXene using Electrochemical Quartz-Crystal Admittance and In Situ Electronic Conductance Measurements. <i>Advanced Energy Materials</i> , 2015 , 5, 1400815	21.8	225
131	Electrochemistry and Electrocatalysis at Single Gold Nanoparticles Attached to Carbon Nanoelectrodes. <i>ChemElectroChem</i> , 2015 , 2, 58-63	4.3	69
130	Not just graphene: The wonderful world of carbon and related nanomaterials. <i>MRS Bulletin</i> , 2015 , 40, 1110-1121	3.2	62
129	Innentitelbild: Synthesis of Carbon/Sulfur Nanolaminates by Electrochemical Extraction of Titanium from Ti2SC (Angew. Chem. 16/2015). <i>Angewandte Chemie</i> , 2015 , 127, 4764-4764	3.6	
128	Probing the Mechanism of High Capacitance in 2D Titanium Carbide Using In Situ X-Ray Absorption Spectroscopy. <i>Advanced Energy Materials</i> , 2015 , 5, 1500589	21.8	374
127	Understanding Defect-Stabilized Noncovalent Functionalization of Graphene. <i>Advanced Materials Interfaces</i> , 2015 , 2, 1500277	4.6	15
126	Formulation of Ionic-Liquid Electrolyte To Expand the Voltage Window of Supercapacitors. <i>Angewandte Chemie</i> , 2015 , 127, 4888-4891	3.6	31
125	Two-Dimensional Vanadium Carbide (MXene) as Positive Electrode for Sodium-Ion Capacitors. Journal of Physical Chemistry Letters, 2015 , 6, 2305-9	6.4	294
124	High rate capacitive performance of single-walled carbon nanotube aerogels. <i>Nano Energy</i> , 2015 , 15, 662-669	17.1	50
123	Solid-phase synthesis, characterization, and cellular activities of collagen-model nanodiamond-peptide conjugates. <i>Biopolymers</i> , 2015 , 104, 186-95	2.2	14
122	Molecular dynamic study of the mechanical properties of two-dimensional titanium carbides Ti(n+1)C(n) (MXenes). <i>Nanotechnology</i> , 2015 , 26, 265705	3.4	144

121	25th anniversary article: MXenes: a new family of two-dimensional materials. <i>Advanced Materials</i> , 2014 , 26, 992-1005	24	3141
120	Freestanding functionalized carbon nanotube-based electrode for solid-state asymmetric supercapacitors. <i>Nano Energy</i> , 2014 , 6, 1-9	17.1	166
119	Layer-by-Layer Oxidation for Decreasing the Size of Detonation Nanodiamond. <i>Chemistry of Materials</i> , 2014 , 26, 3479-3484	9.6	37
118	Enhanced electrochemical performance of hydrous RuO2/mesoporous carbon nanocomposites via nitrogen doping. <i>ACS Applied Materials & amp; Interfaces</i> , 2014 , 6, 9751-9	9.5	57
117	Materials science: Energy storage wrapped up. <i>Nature</i> , 2014 , 509, 568-70	50.4	141
116	Structural Origins of Potential Dependent Hysteresis at the Electrified Graphene/Ionic Liquid Interface. <i>Journal of Physical Chemistry C</i> , 2014 , 118, 569-574	3.8	96
115	Flexible and conductive MXene films and nanocomposites with high capacitance. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2014 , 111, 16676-81	11.5	1204
114	One-step synthesis of nanocrystalline transition metal oxides on thin sheets of disordered graphitic carbon by oxidation of MXenes. <i>Chemical Communications</i> , 2014 , 50, 7420-3	5.8	427
113	High-power and high-energy asymmetric supercapacitors based on Li+-intercalation into a T-Nb2O5/graphene pseudocapacitive electrode. <i>Journal of Materials Chemistry A</i> , 2014 , 2, 17962-17970	13	142
112	TillIMXene as a high capacity electrode material for metal (Li, Na, K, Ca) ion batteries. <i>ACS Applied Materials & ACS Applied &</i>	9.5	847
111	Effect of graphitic structure on electrochemical ion intercalation into positive and negative electrodes. <i>Journal of Solid State Electrochemistry</i> , 2014 , 18, 2673-2682	2.6	14
110	Ring Current Effects: Factors Affecting the NMR Chemical Shift of Molecules Adsorbed on Porous Carbons. <i>Journal of Physical Chemistry C</i> , 2014 , 118, 7508-7514	3.8	86
109	Transparent Conductive Two-Dimensional Titanium Carbide Epitaxial Thin Films. <i>Chemistry of Materials</i> , 2014 , 26, 2374-2381	9.6	778
108	Role of surface structure on Li-ion energy storage capacity of two-dimensional transition-metal carbides. <i>Journal of the American Chemical Society</i> , 2014 , 136, 6385-94	16.4	864
107	Highly porous carbon spheres for electrochemical capacitors and capacitive flowable suspension electrodes. <i>Carbon</i> , 2014 , 77, 155-164	10.4	132
106	Capacitive energy storage in micro-scale devices: recent advances in design and fabrication of micro-supercapacitors. <i>Energy and Environmental Science</i> , 2014 , 7, 867	35.4	961
105	Composite manganese oxide percolating networks as a suspension electrode for an asymmetric flow capacitor. <i>ACS Applied Materials & amp; Interfaces</i> , 2014 , 6, 8886-93	9.5	88
104	Room-Temperature Carbide-Derived Carbon Synthesis by Electrochemical Etching of MAX Phases. Angewandte Chemie, 2014 , 126, 4977-4980	3.6	23

(2013-2014)

103	Innentitelbild: Room-Temperature Carbide-Derived Carbon Synthesis by Electrochemical Etching of MAX Phases (Angew. Chem. 19/2014). <i>Angewandte Chemie</i> , 2014 , 126, 4820-4820	3.6	
102	Freestanding MoO3Ihanobelt/carbon nanotube films for Li-ion intercalation pseudocapacitors. <i>Nano Energy</i> , 2014 , 9, 355-363	17.1	125
101	Ion Intercalation into Graphitic Carbon with a Low Surface Area for High Energy Density Supercapacitors. <i>Journal of the Electrochemical Society</i> , 2014 , 161, A1486-A1494	3.9	22
100	Two-Dimensional Materials: 25th Anniversary Article: MXenes: A New Family of Two-Dimensional Materials (Adv. Mater. 7/2014). <i>Advanced Materials</i> , 2014 , 26, 982-982	24	85
99	Structure of nanocrystalline Ti3C2 MXene using atomic pair distribution function. <i>Physical Review Letters</i> , 2014 , 112, 125501	7.4	129
98	Conductive two-dimensional titanium carbide 'clay' with high volumetric capacitance. <i>Nature</i> , 2014 , 516, 78-81	50.4	2849
97	Hollow graphitic carbon nanospheres: synthesis and properties. <i>Journal of Materials Science</i> , 2014 , 49, 1947-1956	4.3	13
96	Materials science. Where do batteries end and supercapacitors begin?. <i>Science</i> , 2014 , 343, 1210-1	33.3	3680
95	Structure and Electrochemical Performance of Carbide-Derived Carbon Nanopowders. <i>Advanced Functional Materials</i> , 2013 , 23, 1081-1089	15.6	153
94	Knitted and screen printed carbon-fiber supercapacitors for applications in wearable electronics. <i>Energy and Environmental Science</i> , 2013 , 6, 2698	35.4	430
93	Platinized carbon nanoelectrodes as potentiometric and amperometric SECM probes. <i>Journal of Solid State Electrochemistry</i> , 2013 , 17, 2971-2977	2.6	33
92	New two-dimensional niobium and vanadium carbides as promising materials for Li-ion batteries. Journal of the American Chemical Society, 2013 , 135, 15966-9	16.4	1168
91	Cation intercalation and high volumetric capacitance of two-dimensional titanium carbide. <i>Science</i> , 2013 , 341, 1502-5	33.3	2510
90	Onion-like carbon and carbon nanotube film antennas. <i>Applied Physics Letters</i> , 2013 , 103, 073301	3.4	11
89	High-performance symmetric electrochemical capacitor based on graphene foam and nanostructured manganese oxide. <i>AIP Advances</i> , 2013 , 3, 082118	1.5	73
88	In situ tracking of the nanoscale expansion of porous carbon electrodes. <i>Energy and Environmental Science</i> , 2013 , 6, 225-231	35.4	57
87	Photocatalytic WO3 and TiO2 Films on Brass. <i>International Journal of Applied Ceramic Technology</i> , 2013 , 10, 26-32	2	5
86	Facile fabrication of MWCNT-doped NiCoAl-layered double hydroxide nanosheets with enhanced electrochemical performances. <i>Journal of Materials Chemistry A</i> , 2013 , 1, 1963-1968	13	164

85	Intercalation and delamination of layered carbides and carbonitrides. <i>Nature Communications</i> , 2013 , 4, 1716	17.4	1504
84	Vertically Oriented Propylene Carbonate Molecules and Tetraethyl Ammonium Ions in Carbon Slit Pores. <i>Journal of Physical Chemistry C</i> , 2013 , 117, 5752-5757	3.8	22
83	StructureEctivity relationship of Au/ZrO2 catalyst on formation of hydroxyl groups and its influence on CO oxidation. <i>Journal of Materials Chemistry A</i> , 2013 , 1, 6051	13	31
82	Electrical conductivity of thermally hydrogenated nanodiamond powders. <i>Journal of Applied Physics</i> , 2013 , 113, 214307	2.5	50
81	Effect of defects on graphitization of SiC. Journal of Materials Research, 2013, 28, 952-957	2.5	4
80	Low Temperature Plasma Reforming of Hydrocarbon Fuels Into Hydrogen and Carbon Suboxide for Energy Generation Without \$hbox{CO}_{2}\$ Emission. <i>IEEE Transactions on Plasma Science</i> , 2012 , 40, 1362-1370	1.3	6
79	Challenges in Ceramic Science: A Report from the Workshop on Emerging Research Areas in Ceramic Science. <i>Journal of the American Ceramic Society</i> , 2012 , 95, 3699-3712	3.8	51
78	Two-dimensional transition metal carbides. <i>ACS Nano</i> , 2012 , 6, 1322-31	16.7	2382
77	First principles study of two-dimensional early transition metal carbides. <i>MRS Communications</i> , 2012 , 2, 133-137	2.7	316
76	Three-dimensional nanostructures from porous anodic alumina. MRS Communications, 2012, 2, 51-54	2.7	1
75	Nanoprobes for intracellular and single cell surface-enhanced Raman spectroscopy (SERS). <i>Journal of Raman Spectroscopy</i> , 2012 , 43, 817-827	2.3	60
74	The Electrochemical Flow Capacitor: A New Concept for Rapid Energy Storage and Recovery. <i>Advanced Energy Materials</i> , 2012 , 2, 895-902	21.8	176
73	Electrochemical Flow Cells: The Electrochemical Flow Capacitor: A New Concept for Rapid Energy Storage and Recovery (Adv. Energy Mater. 7/2012). <i>Advanced Energy Materials</i> , 2012 , 2, 911-911	21.8	4
72	Carbide-derived carbon monoliths with hierarchical pore architectures. <i>Angewandte Chemie - International Edition</i> , 2012 , 51, 7577-80	16.4	120
71	Cytokine Removal: Hierarchical Porous Carbide-Derived Carbons for the Removal of Cytokines from Blood Plasma (Adv. Healthcare Mater. 6/2012). <i>Advanced Healthcare Materials</i> , 2012 , 1, 682-682	10.1	3
70	Understanding controls on interfacial wetting at epitaxial graphene: Experiment and theory. <i>Physical Review B</i> , 2012 , 85,	3.3	85
69	Structure of Nanocrystalline BN and BN/C Coatings on SiC. Ceramic Transactions, 2012, 109-119	0.1	
68	Carbon coated textiles for flexible energy storage. Energy and Environmental Science, 2011, 4, 5060	35.4	438

(2010-2011)

67	Capacitive Energy Storage from B0 to 100 LC Using an Ionic Liquid Electrolyte. <i>Journal of Physical Chemistry Letters</i> , 2011 , 2, 2396-2401	6.4	308
66	Effect of pore size on carbon dioxide sorption by carbide derived carbon. <i>Energy and Environmental Science</i> , 2011 , 4, 3059	35.4	459
65	Preventing Sodium Poisoning of Photocatalytic TiO2 Films on Glass by Metal Doping. <i>International Journal of Applied Glass Science</i> , 2011 , 2, 108-116	1.8	21
64	Effect of Calcination Temperature and Environment on Photocatalytic and Mechanical Properties of Ultrathin Sol G el Titanium Dioxide Films. <i>Journal of the American Ceramic Society</i> , 2011 , 94, 1101-1108	8 ^{3.8}	12
63	On the Topotactic Transformation of Ti2AlC into a Ti IIDE Cubic Phase by Heating in Molten Lithium Fluoride in Air. <i>Journal of the American Ceramic Society</i> , 2011 , 94, 4556-4561	3.8	59
62	Carbide-Derived Carbons From Porous Networks to Nanotubes and Graphene. <i>Advanced Functional Materials</i> , 2011 , 21, 810-833	15.6	524
61	Brick-and-Mortar Self-Assembly Approach to Graphitic Mesoporous Carbon Nanocomposites. <i>Advanced Functional Materials</i> , 2011 , 21, 2208-2215	15.6	93
60	Two-dimensional nanocrystals produced by exfoliation of Ti3 AlC2. Advanced Materials, 2011, 23, 4248-	534	4846
59	Flexible Nano-felts of Carbide-Derived Carbon with Ultra-high Power Handling Capability. <i>Advanced Energy Materials</i> , 2011 , 1, 423-430	21.8	159
58	STORAGE MATERIALS: Flexible Nano-felts of Carbide-Derived Carbon with Ultra-high Power Handling Capability (Adv. Energy Mater. 3/2011). <i>Advanced Energy Materials</i> , 2011 , 1, 422-422	21.8	2
57	Continuous carbide-derived carbon films with high volumetric capacitance. <i>Energy and Environmental Science</i> , 2011 , 4, 135-138	35.4	157
56	Synthesis of quasi-oriented \text{HoO3} nanobelts and nanoplatelets on TiO2 coated glass. <i>Journal of Materials Chemistry</i> , 2011 , 21, 7931		22
55	Synthesis of a new nanocrystalline titanium aluminum fluoride phase by reaction of Ti2AlC with hydrofluoric acid. <i>RSC Advances</i> , 2011 , 1, 1493	3.7	35
54	Ultrahigh-power micrometre-sized supercapacitors based on onion-like carbon. <i>Nature Nanotechnology</i> , 2010 , 5, 651-4	28.7	2188
53	Curvature effects in carbon nanomaterials: Exohedral versus endohedral supercapacitors. <i>Journal of Materials Research</i> , 2010 , 25, 1525-1531	2.5	121
52	Materials science. High-temperature rubber made from carbon nanotubes. <i>Science</i> , 2010 , 330, 1332-3	33.3	54
51	Materials for electrochemical capacitors 2010 , 138-147		12
50	Monolithic carbide-derived carbon films for micro-supercapacitors. <i>Science</i> , 2010 , 328, 480-3	33.3	1099

Titanium dioxide-coated nanofibers for advanced filters. Journal of Nanoparticle Research, 2010, 12, 2511-351939

48	Copper Azide Confined Inside Templated Carbon Nanotubes. <i>Advanced Functional Materials</i> , 2010 , 20, 3168-3174	15.6	58
47	Effects of Deposition Conditions on the Structure and Chemical Properties of Carbon Nanopipettes. <i>Chemical Vapor Deposition</i> , 2009 , 15, 204-208		19
46	Molybdenum carbide-derived carbon for hydrogen storage. <i>Microporous and Mesoporous Materials</i> , 2009 , 120, 267-271	5.3	29
45	Purification of carbon nanotubes by dynamic oxidation in air. <i>Journal of Materials Chemistry</i> , 2009 , 19, 7904		46
44	Contribution of Functional Groups to the Raman Spectrum of Nanodiamond Powders. <i>Chemistry of Materials</i> , 2009 , 21, 273-279	9.6	212
43	Materials for electrochemical capacitors 2009 , 320-329		136
42	Materials for electrochemical capacitors. <i>Nature Materials</i> , 2008 , 7, 845-54	27	12536
41	Magnetostatic interactions between carbon nanotubes filled with magnetic nanoparticles. <i>Applied Physics Letters</i> , 2008 , 92, 233117	3.4	40
40	Review: static and dynamic behavior of liquids inside carbon nanotubes. <i>Microfluidics and Nanofluidics</i> , 2008 , 5, 289-305	2.8	211
39	SERS intensity optimization by controlling the size and shape of faceted gold nanoparticles. <i>Journal of Raman Spectroscopy</i> , 2008 , 39, 61-67	2.3	65
38	Bactericidal activity of chlorine-loaded carbide-derived carbon against Escherichia coli and Bacillus anthracis. <i>Journal of Biomedical Materials Research - Part A</i> , 2008 , 84, 607-13	5.4	3
37	Field controlled nematic-to-isotropic phase transition in liquid crystal@arbon nanotube composites. <i>Journal of Applied Physics</i> , 2008 , 103, 064314	2.5	25
36	Monitoring oxidation of multiwalled carbon nanotubes by Raman spectroscopy. <i>Journal of Raman Spectroscopy</i> , 2007 , 38, 728-736	2.3	482
35	Carbothermal Synthesis of BiC Micro-Ribbons. <i>Journal of the American Ceramic Society</i> , 2007 , 91, 83-87	3.8	14
34	Self-assembled Multi-walled Carbon Nanotube Coatings. <i>Materials Research Society Symposia Proceedings</i> , 2007 , 1057, 1		
33	High Temperature Functionalization and Surface Modification of Nanodiamond Powders. <i>Materials Research Society Symposia Proceedings</i> , 2007 , 1039, 1		9
32	Imaging of liquid crystals confined in carbon nanopipes. <i>Applied Physics Letters</i> , 2006 , 89, 043123	3.4	5

(2003-2006)

31	Coelectrospinning of Carbon Nanotube Reinforced Nanocomposite Fibrils. <i>ACS Symposium Series</i> , 2006 , 231-245	0.4	4
30	Formation of Porous SiC Ceramics by Pyrolysis of Wood Impregnated with Silica. <i>International Journal of Applied Ceramic Technology</i> , 2006 , 3, 485-490	2	33
29	Synthesis of Carbide-Derived Carbon by Chlorination of Ti2AlC. Chemistry of Materials, 2005, 17, 2317-	233218	79
28	Tailoring of nanoscale porosity in carbide-derived carbons for hydrogen storage. <i>Journal of the American Chemical Society</i> , 2005 , 127, 16006-7	16.4	294
27	Carbothermal Synthesis of Al-O-N Coatings Increasing Strength of SiC Fibers. <i>International Journal of Applied Ceramic Technology</i> , 2005 , 1, 68-75	2	5
26	Guiding water into carbon nanopipes with the aid of bipolar electrochemistry. <i>Microfluidics and Nanofluidics</i> , 2005 , 1, 284-288	2.8	34
25	Theoretical and experimental investigation of aqueous liquids contained in carbon nanotubes. <i>Journal of Applied Physics</i> , 2005 , 97, 124309	2.5	26
24	Controlling dissociative adsorption for effective growth of carbon nanotubes. <i>Applied Physics Letters</i> , 2004 , 85, 3265-3267	3.4	31
23	Examining pressure-induced phase transformations in silicon by spherical indentation and Raman spectroscopy: A statistical study. <i>Journal of Materials Research</i> , 2004 , 19, 3099-3108	2.5	81
22	GaN nanoindentation: A micro-Raman spectroscopy study of local strain fields. <i>Journal of Applied Physics</i> , 2004 , 96, 2853-2856	2.5	58
21	Effect of Carrier Gas on the Growth Rate, Growth Density, and Structure of Carbon Nanotubes. <i>Materials Research Society Symposia Proceedings</i> , 2004 , 818, 84		4
20	DNET: The Drexel Nano Engineering Track. <i>Materials Research Society Symposia Proceedings</i> , 2004 , 827, 182		
19	Testing Multiwall Carbon Nanotubes on Ion Erosion for Advanced Space Propulsion. <i>Materials Research Society Symposia Proceedings</i> , 2004 , 821, 147		5
18	Synthesis of Boron Nitride Coating on Carbon Nanotubes. <i>Journal of the American Ceramic Society</i> , 2004 , 87, 147-151	3.8	39
17	Synthesis of graphite by chlorination of iron carbide at moderate temperatures. <i>Journal of Materials Chemistry</i> , 2004 , 14, 238		88
16	How safe are nanotubes and other nanofilaments?. <i>Materials Research Innovations</i> , 2003 , 7, 192-194	1.9	35
15	Carbothermal Synthesis of Boron Nitride Coatings on Silicon Carbide. <i>Journal of the American Ceramic Society</i> , 2003 , 86, 1830-1837	3.8	35
14	Nanoporous carbide-derived carbon with tunable pore size. <i>Nature Materials</i> , 2003 , 2, 591-4	27	599

13	Electrospinning of Carbon Nanotube Reinforced Nanocomposite Fibrils and Yarns. <i>Materials Research Society Symposia Proceedings</i> , 2003 , 791, 1		5
12	Numerical Derivative Analysis of Load-Displacement Curves in DepthSensing Indentation. <i>Materials Research Society Symposia Proceedings</i> , 2003 , 791, 268		1
11	High-Speed Ionic Synaptic Memory Based on 2D Titanium Carbide MXene. <i>Advanced Functional Materials</i> ,2109970	15.6	9
10	Surface Redox Pseudocapacitance of Partially Oxidized Titanium Carbide MXene in Water-in-Salt Electrolyte. <i>ACS Energy Letters</i> ,30-35	20.1	7
9	Towards Watt-scale hydroelectric energy harvesting by Ti3C2Tx-based transpiration-driven electrokinetic power generators. <i>Energy and Environmental Science</i> ,	35.4	14
8	Highly Broadband Absorber Using Plasmonic Titanium Carbide (MXene)		1
7	MXtrodes: MXene-infused bioelectronic interfaces for multiscale electrophysiology and stimulation		1
6	An aqueous 2.1 V pseudocapacitor with MXene and V-MnO2 electrodes. <i>Nano Research</i> ,1	10	6
5	Enhancing the Energy Storage Capabilities of Ti3C2Tx MXene Electrodes by Atomic Surface Reduction. <i>Advanced Functional Materials</i> ,2106294	15.6	4
4	Evaluation of two-dimensional transition-metal carbides and carbonitrides (MXenes) for SERS substrates. <i>MRS Bulletin</i> ,1	3.2	4
3	MXenes for Photonics. ACS Photonics,	6.3	5
2	MXene chemistry, electrochemistry and energy storage applications. <i>Nature Reviews Chemistry</i> ,	34.6	35