

# Hongbo Zeng

## List of Publications by Year in Descending Order

**Source:** <https://exaly.com/author-pdf/3081140/hongbo-zeng-publications-by-year.pdf>

**Version:** 2024-04-17

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.

429  
papers

14,128  
citations

63  
h-index

98  
g-index

454  
ext. papers

17,515  
ext. citations

7.6  
avg, IF

7.16  
L-index

#	Paper	IF	Citations
429	Revisiting the adhesion mechanism of mussel-inspired chemistry.. <i>Chemical Science</i> , <b>2022</b> , 13, 1698-1705	9.4	3
428	Interfacial Partitioning Enhances Microextraction by Multicomponent Nanodroplets. <i>Journal of Physical Chemistry C</i> , <b>2022</b> , 126, 1326-1336	3.8	3
427	Treatment Technologies for Organics and Silica Removal in Steam-Assisted Gravity Drainage Produced Water: A Comprehensive Review. <i>Energy &amp; Fuels</i> , <b>2022</b> , 36, 1205-1231	4.1	1
426	Phosphate Removal from Wastewater by Magnetic Amorphous Lanthanum Silicate Alginate Hydrogel Beads. <i>Minerals (Basel, Switzerland)</i> , <b>2022</b> , 12, 171	2.4	1
425	Soft armour-like layer-protected hydrogels for wet tissue adhesion and biological imaging. <i>Chemical Engineering Journal</i> , <b>2022</b> , 434, 134418	14.7	4
424	Electrochemically reconstructed perovskite with cooperative catalytic sites for CO <sub>2</sub> -to-formate conversion. <i>Applied Catalysis B: Environmental</i> , <b>2022</b> , 306, 121101	21.8	2
423	Probing Anion-π Interactions between fluoroarene and carboxylate anion in aqueous solutions.. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 615, 778-785	9.3	2
422	Unraveling roles of lead ions in selective flotation of scheelite and fluorite from atomic force microscopy and first-principles calculations. <i>Minerals Engineering</i> , <b>2022</b> , 179, 107424	4.9	0
421	A new cyclic carbonate enables high power/ low temperature lithium-ion batteries. <i>Energy Storage Materials</i> , <b>2022</b> , 45, 14-23	19.4	7
420	Facile and scalable surface functionalization approach with small silane molecules for oil/water separation and demulsification of surfactant/asphaltenes-stabilized emulsions. <i>Separation and Purification Technology</i> , <b>2022</b> , 285, 120382	8.3	1
419	Decarbonization of mineral processing operations: Realizing the potential of carbon capture and utilization in the processing of ultramafic nickel ores. <i>Chemical Engineering Journal</i> , <b>2022</b> , 433, 134203	14.7	0
418	Interactions of model airborne particulate matter with dipalmitoyl phosphatidylcholine and a clinical surfactant Calsurf. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 607, 1993-2009	9.3	0
417	Mussel-inspired superhydrophilic membrane constructed on a hydrophilic polymer network for highly efficient oil/water separation. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 608, 702-710	9.3	7
416	Principles of Cation-π Interactions for Engineering Mussel-Inspired Functional Materials.. <i>Accounts of Chemical Research</i> , <b>2022</b> ,	24.3	4
415	Self-healing, reusable and conductive cellulose nanocrystals-containing adhesives. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , <b>2022</b> , 643, 128797	5.1	2
414	Surface modified silver/magnetite nanocomposite activating hydrogen peroxide for efficient degradation of chlorophenols.. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 617, 246-256	9.3	0
413	Stretchable, compressible, and conductive hydrogel for sensitive wearable soft sensors.. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 618, 111-120	9.3	5

412	Effects of chemical inhibitors on the scaling behaviors of calcite and the associated surface interaction mechanisms.. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 618, 507-517	9.3	0
411	Smart waterborne composite coating with passive/active protective performances using nanocontainers based on metal organic frameworks derived layered double hydroxides.. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 619, 132-147	9.3	1
410	Contribution of protein microgels, protein molecules, and polysaccharides to the emulsifying behaviors of core/shell whey protein-alginate microgel systems. <i>Food Hydrocolloids</i> , <b>2022</b> , 129, 107670	10.6	1
409	Zwitterionic ionic liquids modulating two-dimensional hierarchically porous zeolitic imidazolate framework composites.. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 620, 365-375	9.3	1
408	Highly stretchable, elastic, antimicrobial conductive hydrogels with environment-adaptive adhesive property for health monitoring.. <i>Journal of Colloid and Interface Science</i> , <b>2022</b> , 622, 612-624	9.3	1
407	Metal organic frameworks (MOFs) as multifunctional nanoplatform for anticorrosion surfaces and coatings. <i>Advances in Colloid and Interface Science</i> , <b>2022</b> , 102707	14.3	3
406	Nanometer-Scale Force Profiles of Short Single- and Double-Stranded DNA Molecules on a Gold Surface Measured Using a Surface Forces Apparatus. <i>Langmuir</i> , <b>2021</b> , 37, 13346-13352	4	1
405	Unplugging Standalone Sand-Control Screens Using High-Power Shock Waves. <i>SPE Drilling and Completion</i> , <b>2021</b> , 36, 398-412	1.4	2
404	In-situ generated hydroxides realize near-unity CO selectivity for electrochemical CO2 reduction. <i>Chemical Engineering Journal</i> , <b>2021</b> , 433, 133785	14.7	1
403	Bench-scale oil fouling/antifouling tests under high temperature and high pressure conditions and the underlying interfacial interaction mechanisms. <i>Fuel</i> , <b>2021</b> , 314, 122720	7.1	2
402	High-efficiency and durable removal of water-in-heavy oil emulsions enabled by delignified and carboxylated basswood with zwitterionic nanohydrogel coatings.. <i>Journal of Colloid and Interface Science</i> , <b>2021</b> , 612, 445-458	9.3	0
401	BiO Nanosheets Grown on Carbon Nanofiber with Inherent Hydrophobicity for High-Performance CO Electroreduction in a Wide Potential Window. <i>ACS Nano</i> , <b>2021</b> ,	16.7	10
400	Coacervate-Based Instant and Repeatable Underwater Adhesive with Anticancer and Antibacterial Properties. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2021</b> , 13, 48239-48251	9.5	9
399	2D Material Nanofiltration Membranes: From Fundamental Understandings to Rational Design. <i>Advanced Science</i> , <b>2021</b> , 8, e2102493	13.6	6
398	The role of fouling materials strength on unplugging sand control devices using an electrohydraulic stimulation technique. <i>Journal of Petroleum Science and Engineering</i> , <b>2021</b> , 208, 109689	4.4	0
397	Recent advances in bubble-based technologies: Underlying interaction mechanisms and applications. <i>Applied Physics Reviews</i> , <b>2021</b> , 8, 011315	17.3	5
396	Dual Cross-Linked Hydrogels with Injectable, Self-Healing, and Antibacterial Properties Based on the Chemical and Physical Cross-Linking. <i>Biomacromolecules</i> , <b>2021</b> , 22, 1685-1694	6.9	11
395	Graphene-based materials for adsorptive removal of pollutants from water and underlying interaction mechanism. <i>Advances in Colloid and Interface Science</i> , <b>2021</b> , 289, 102360	14.3	18

- 394 Nanomechanics of Lignin-Cellulase Interactions in Aqueous Solutions. *Biomacromolecules*, **2021**, 22, 2036-2042
- 393 Graphene oxide-based noble-metal nanoparticles composites for environmental application. *Composites Communications*, **2021**, 24, 100645 6.7 9
- 392 Characterizing foulants on slotted liner and probing the surface interaction mechanisms in organic media with implication for an antifouling strategy in oil production. *Fuel*, **2021**, 290, 120008 7.1 6
- 391 Mechanically Strong Proteinaceous Fibers: Engineered Fabrication by Microfluidics. *Engineering*, **2021**, 9.7 9
- 390 Injectable Self-Healing Hydrogel via Biological Environment-Adaptive Supramolecular Assembly for Gastric Perforation Healing. *ACS Nano*, **2021**, 15, 9913-9923 16.7 12
- 389 Modulating surface interactions for regenerable separation of oil-in-water emulsions. *Journal of Membrane Science*, **2021**, 625, 119140 9.6 8
- 388 A Janus facilitated transport membrane with asymmetric surface wettability and dense/porous structure: Enabling high stability and separation efficiency. *Journal of Membrane Science*, **2021**, 626, 119183 9.6 3
- 387 Electronic Delocalization of Bismuth Oxide Induced by Sulfur Doping for Efficient CO<sub>2</sub> Electroreduction to Formate. *ACS Catalysis*, **2021**, 11, 7604-7612 13.1 21
- 386 Ultra-strong bio-glue from genetically engineered polypeptides. *Nature Communications*, **2021**, 12, 3613 17.4 32
- 385 Probing the Interactions between Pickering Emulsion Droplets Stabilized with pH-Responsive Nanoparticles. *Journal of Physical Chemistry B*, **2021**, 125, 7320-7331 3.4 3
- 384 Role of Ca<sup>2+</sup> in the CO<sub>2</sub> corrosion behavior and film characteristics of N80 steel and electroless Ni-B coating at high temperature and high pressure. *Materials Chemistry and Physics*, **2021**, 267, 124618 4.4 4
- 383 Unraveling the Interaction of Water-in-Oil Emulsion Droplets via Molecular Simulations and Surface Force Measurements. *Journal of Physical Chemistry B*, **2021**, 125, 7556-7567 3.4 1
- 382 Size Effect on the Reaction Rate of Surface Nanodroplets. *Journal of Physical Chemistry C*, **2021**, 125, 15324-15334 3.8 0
- 381 Effect of non-ionic surfactants on the adsorption of polycyclic aromatic compounds at water/oil interface: A molecular simulation study. *Journal of Colloid and Interface Science*, **2021**, 586, 766-777 9.3 6
- 380 Tannic acid/Fe<sup>3+</sup> functionalized magnetic graphene oxide nanocomposite with high loading of silver nanoparticles as ultra-efficient catalyst and disinfectant for wastewater treatment. *Chemical Engineering Journal*, **2021**, 405, 126629 14.7 34
- 379 One-step multiple-site integration strategy for CO<sub>2</sub> capture and conversion into cyclic carbonates under atmospheric and cocatalyst/metal/solvent-free conditions. *Applied Catalysis B: Environmental*, **2021**, 283, 119620 21.8 25
- 378 Novel multifunctional solid slippery surfaces with self-assembled fluorine-free small molecules. *Chemical Engineering Journal*, **2021**, 404, 127064 14.7 5
- 377 Stabilization mechanism and chemical demulsification of water-in-oil and oil-in-water emulsions in petroleum industry: A review. *Fuel*, **2021**, 286, 119390 7.1 42

376	In-situ probing of electrochemical dissolution and surface properties of chalcopyrite with implications for the dissolution kinetics and passivation mechanism. <i>Journal of Colloid and Interface Science</i> , <b>2021</b> , 584, 103-113	9.3	8
375	Utilization of waste cooking oil for highly efficient recovery of unburned carbon from coal fly ash. <i>Journal of Cleaner Production</i> , <b>2021</b> , 282, 124547	10.3	4
374	A three-dimensional crosslinked chitosan sulfate network binder for high-performance LiS batteries. <i>Journal of Energy Chemistry</i> , <b>2021</b> , 56, 171-178	12	7
373	Probing the corrosion resistance of a smart electroless Ni-P composite coating embedded with pH-responsive corrosion inhibitor-loaded nanocapsules. <i>Chemical Engineering Journal</i> , <b>2021</b> , 421, 127752	14.7	5
372	Dual-Cross-Linked Network Hydrogels with Multiresponsive, Self-Healing, and Shear Strengthening Properties. <i>Biomacromolecules</i> , <b>2021</b> , 22, 800-810	6.9	9
371	Recent advances in electrochemical techniques for characterizing surface properties of minerals. <i>Advances in Colloid and Interface Science</i> , <b>2021</b> , 288, 102346	14.3	10
370	Metal chelation based supramolecular self-assembly enables a high-performance organic anode for lithium ion batteries. <i>Chemical Engineering Journal</i> , <b>2021</b> , 413, 127525	14.7	3
369	Mussel-inspired adhesive and conductive hydrogel with tunable mechanical properties for wearable strain sensors. <i>Journal of Colloid and Interface Science</i> , <b>2021</b> , 585, 420-432	9.3	41
368	Intermolecular and Surface Interactions in Engineering Processes. <i>Engineering</i> , <b>2021</b> , 7, 63-83	9.7	8
367	Soy-Based Adhesives Functionalized with Pressure-Responsive Crosslinker Microcapsules for Enhanced Wet Adhesion. <i>ACS Applied Polymer Materials</i> , <b>2021</b> , 3, 1032-1041	4.3	5
366	Probing the In Situ Redox Behavior of Selenium on a Pyrite Surface by Scanning Electrochemical Microscopy. <i>Journal of Physical Chemistry C</i> , <b>2021</b> , 125, 3018-3026	3.8	1
365	Coacervation-driven instant paintable underwater adhesives with tunable optical and electrochromic properties. <i>Journal of Materials Chemistry A</i> , <b>2021</b> , 9, 12988-13000	13	13
364	Nanomechanical Insights into Versatile Polydopamine Wet Adhesive Interacting with Liquid-Infused and Solid Slippery Surfaces. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2021</b> , 13, 6941-6950	9.5	7
363	Surface reactivity of the cyanobacterium <i>Synechocystis</i> sp. PCC 6803 [Implications for trace metals transport to the oceans. <i>Chemical Geology</i> , <b>2021</b> , 562, 120045	4.2	1
362	Effect of interaction between two single-particle-impingements on the repassivation behavior of 304 stainless steel in a simulated groundwater. <i>Corrosion Reviews</i> , <b>2021</b> , 39, 149-164	3.2	
361	Understanding the hetero-aggregation mechanism among sulfide and oxide mineral particles driven by bifunctional surfactants: Intensification flotation of oxide minerals. <i>Minerals Engineering</i> , <b>2021</b> , 169, 106928	4.9	3
360	Self-healing Hydrogels and Underlying Reversible Intermolecular Interactions. <i>Chinese Journal of Polymer Science (English Edition)</i> , <b>2021</b> , 39, 1246-1261	3.5	4
359	Catechol-Vanadium Binding Enhances Cross-Linking and Mechanics of a Mussel Byssus Coating Protein. <i>Chemistry of Materials</i> , <b>2021</b> , 33, 6530-6540	9.6	6

358	High Molecular Weight Guar Gum Assisted Settling of Fine Solids in Diluted Bitumen: Effect of Solvents. <i>Petroleum Science</i> , <b>2021</b> ,	4.4	2
357	Surface interaction mechanisms in mineral flotation: Fundamentals, measurements, and perspectives. <i>Advances in Colloid and Interface Science</i> , <b>2021</b> , 295, 102491	14.3	12
356	Ion-specific effect on self-cleaning performances of polyelectrolyte-functionalized membranes and the underlying nanomechanical mechanism. <i>Journal of Membrane Science</i> , <b>2021</b> , 634, 119408	9.6	1
355	Uncovering the hydrophobic mechanism of a novel dithiocarbamate-hydroxamate surfactant towards galena. <i>Chemical Engineering Science</i> , <b>2021</b> , 245, 116765	4.4	7
354	Anti-biofouling materials and surfaces based on mussel-inspired chemistry. <i>Materials Advances</i> , <b>2021</b> , 2, 2216-2230	3.3	1
353	Enhanced Adsorption of Anionic Polymer on Montmorillonite by Divalent Cations and the Effect of Salinity. <i>Journal of Physical Chemistry A</i> , <b>2021</b> , 125, 1025-1035	2.8	3
352	Cancer theranostic platforms based on injectable polymer hydrogels. <i>Biomaterials Science</i> , <b>2021</b> , 9, 3543-3575	7.4	4
351	Recoverable underwater superhydrophobicity from a fully wetted state via dynamic air spreading. <i>IScience</i> , <b>2021</b> , 24, 103427	6.1	0
350	Dynamic Flexible Hydrogel Network with Biological Tissue-like Self-Protective Functions. <i>Chemistry of Materials</i> , <b>2020</b> , 32, 10545-10555	9.6	10
349	Assembly of Ultralight Dual Network Graphene Aerogel with Applications for Selective Oil Absorption. <i>Langmuir</i> , <b>2020</b> , 36, 13698-13707	4	15
348	Ultra elastic, stretchable, self-healing conductive hydrogels with tunable optical properties for highly sensitive soft electronic sensors. <i>Journal of Materials Chemistry A</i> , <b>2020</b> , 8, 24718-24733	13	45
347	Molecular simulation of folding and aggregation of multi-core polycyclic aromatic compounds. <i>Journal of Molecular Liquids</i> , <b>2020</b> , 310, 113248	6	2
346	Ultra-efficient and stable heterogeneous iron-based Fenton nanocatalysts for degrading organic dyes at neutral pH via a chelating effect under nanoconfinement. <i>Chemical Communications</i> , <b>2020</b> , 56, 6571-6574	5.8	14
345	Interfacial ion specificity modulates hydrophobic interaction. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 578, 135-145	9.3	10
344	A new method to obtain the repassivation time of passive materials based on the single particle impingement. <i>Corrosion Science</i> , <b>2020</b> , 170, 108717	6.8	2
343	Effect of salinity on adsorption and interaction forces of hydrophobically modified polyacrylamide on silica and alumina surfaces. <i>Minerals Engineering</i> , <b>2020</b> , 150, 106280	4.9	6
342	Polyacrylamide/Alginate double-network tough hydrogels for intraoral ultrasound imaging. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 578, 598-607	9.3	21
341	Bio-Inspired Passion Fruit-like FeO@C Nanospheres Enabling High-Stability Magnetorheological Performances. <i>Langmuir</i> , <b>2020</b> , 36, 7706-7714	4	7

340	Electrochemical investigation of the interactions of organic and inorganic depressants on basal and edge planes of molybdenite. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 570, 350-361	9.3	7
339	Water-Based Dual-Cross-Linked Polymer Binders for High-Energy-Density Lithium-Sulfur Batteries. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2020</b> , 12, 29316-29323	9.5	3
338	Unplugging Standalone Sand Control Screens with High-power Shock Waves: An Experimental Study <b>2020</b> ,		3
337	Understanding the Interaction Mechanism between Elemental Selenium and Ferric Hydroxide in Wastewater Treatment. <i>Industrial &amp; Engineering Chemistry Research</i> , <b>2020</b> , 59, 6662-6671	3.9	5
336	A bioinspired hydrogen bond crosslink strategy toward toughening ultrastrong and multifunctional nanocomposite hydrogels. <i>Journal of Materials Chemistry B</i> , <b>2020</b> , 8, 4002-4015	7.3	36
335	New insights into the interfacial behavior and swelling of polymer inclusion membrane (PIM) during Zn (II) extraction process. <i>Chemical Engineering Science</i> , <b>2020</b> , 220, 115620	4.4	8
334	Surface forces and interaction mechanisms of soft thin films under confinement: a short review. <i>Soft Matter</i> , <b>2020</b> , 16, 6697-6719	3.6	7
333	A Laboratory Workflow for Characterization of Scaling Deposits in Thermal Wells. <i>Energies</i> , <b>2020</b> , 13, 3184	3.1	1
332	Probing the Interaction Mechanism between Benzohydroxamic Acid and Mineral Surface in the Presence of Pb Ions by AFM Force Measurements and First-Principles Calculations. <i>Langmuir</i> , <b>2020</b> , 36, 8199-8208	4	12
331	Speeding up biphasic reactions with surface nanodroplets. <i>Lab on A Chip</i> , <b>2020</b> , 20, 2965-2974	7.2	7
330	Hydrogels <b>2020</b> , 203-244		6
329	Buckling Effect of Sole Zeolitic Imidazolate Framework-8 Nanoparticles Adsorbed at the Water/Oil Interface. <i>Langmuir</i> , <b>2020</b> , 36, 2322-2329	4	6
328	Novel sodium alginate-assisted MXene nanosheets for ultrahigh rejection of multiple cations and dyes. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 568, 36-45	9.3	16
327	Recent Advances in Mechano-Responsive Hydrogels for Biomedical Applications. <i>ACS Applied Polymer Materials</i> , <b>2020</b> , 2, 1092-1107	4.3	27
326	Challenges in developing polymer flocculants to improve bitumen quality in non-aqueous extraction processes: an experimental study. <i>Petroleum Science</i> , <b>2020</b> , 17, 811-821	4.4	11
325	Surface Interactions between Water-in-Oil Emulsions with Asphaltenes and Electroless Nickel-Phosphorus Coating. <i>Langmuir</i> , <b>2020</b> , 36, 897-905	4	9
324	Recent Advances in the Quantification and Modulation of Hydrophobic Interactions for Interfacial Applications. <i>Langmuir</i> , <b>2020</b> , 36, 2985-3003	4	25
323	Self-Regulated Phenomenon of Inorganic Artificial Solid Electrolyte Interphase for Lithium Metal Batteries. <i>Nano Letters</i> , <b>2020</b> , 20, 4029-4037	11.5	47

322	Recent advances in designing conductive hydrogels for flexible electronics. <i>Information Materials</i> , <b>2020</b> , 2, 843-865	23.1	63
321	Probing the intermolecular interaction mechanisms between humic acid and different substrates with implications for its adsorption and removal in water treatment. <i>Water Research</i> , <b>2020</b> , 176, 115766	12.5	20
320	Insights into the Electrochemical Corrosion Behavior and Mechanism of Electroless Ni-P Coating in the CO <sub>2</sub> /H <sub>2</sub> S/Cl <sup>-</sup> Environment. <i>Corrosion</i> , <b>2020</b> , 76, 578-590	1.8	6
319	Synergetic adsorption of polymers on montmorillonite: Insights from molecular dynamics simulations. <i>Applied Clay Science</i> , <b>2020</b> , 193, 105654	5.2	9
318	Bio-inspired membrane with adaptable wettability for smart oil/water separation. <i>Journal of Membrane Science</i> , <b>2020</b> , 598, 117661	9.6	39
317	Tannic acid modified MoS <sub>2</sub> nanosheet membranes with superior water flux and ion/dye rejection. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 560, 177-185	9.3	15
316	Nanomechanics of Anion- $\pi$ Interaction in Aqueous Solution. <i>Journal of the American Chemical Society</i> , <b>2020</b> , 142, 1710-1714	16.4	48
315	Recent progress in synthesis and application of mussel-inspired adhesives. <i>Nanoscale</i> , <b>2020</b> , 12, 1307-1324	7.7	113
314	Role of molecular architecture in the modulation of hydrophobic interactions. <i>Current Opinion in Colloid and Interface Science</i> , <b>2020</b> , 47, 58-69	7.6	17
313	Insights into the erosion-enhanced corrosion on electroless Ni-P coating from single particle impingement. <i>Corrosion Science</i> , <b>2020</b> , 166, 108422	6.8	12
312	Polydopamine Nanotubes Decorated with Ag Nanoparticles as Catalyst for the Reduction of Methylene Blue. <i>ACS Applied Nano Materials</i> , <b>2020</b> , 3, 156-164	5.6	12
311	Mussel-inspired cellulose-based adhesive with biocompatibility and strong mechanical strength via metal coordination. <i>International Journal of Biological Macromolecules</i> , <b>2020</b> , 144, 127-134	7.9	34
310	Recyclable Ag-decorated highly carbonaceous magnetic nanocomposites for the removal of organic pollutants. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 562, 52-62	9.3	24
309	Effect of Charge Density of Reverse Emulsion Breaker on Demulsification Performance for Steam-Assisted Gravity Drainage (SAGD) Emulsions under High Temperature and High Pressure. <i>Energy &amp; Fuels</i> , <b>2020</b> , 34, 13893-13902	4.1	3
308	Interactions of particulate matter and pulmonary surfactant: Implications for human health. <i>Advances in Colloid and Interface Science</i> , <b>2020</b> , 284, 102244	14.3	22
307	Adhesive Coacervates Driven by Hydrogen-Bonding Interaction. <i>Small</i> , <b>2020</b> , 16, e2004132	11	26
306	Nanomechanics of $\pi$ - $\pi$ Interaction with implications for bio-inspired wet adhesion. <i>Acta Biomaterialia</i> , <b>2020</b> , 117, 294-301	10.8	12
305	Characterization and corrosion behavior of electroless Ni-Mo-P/Ni-P composite coating in CO <sub>2</sub> /H <sub>2</sub> S/Cl <sup>-</sup> brine: Effects of Mo addition and heat treatment. <i>Surface and Coatings Technology</i> , <b>2020</b> , 403, 126416	4.4	7



304	Bioinspired Lignin-Polydopamine Nanocapsules with Strong Bioadhesion for Long-Acting and High-Performance Natural Sunscreens. <i>Biomacromolecules</i> , <b>2020</b> , 21, 3231-3241	6.9	27
303	Progress in Bioinspired Dry and Wet Gradient Materials from Design Principles to Engineering Applications. <i>IScience</i> , <b>2020</b> , 23, 101749	6.1	7
302	Unusual Surface Ligand Doping-Induced p-Type Quantum Dot Solids and Their Application in Solar Cells. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2020</b> ,	9.5	3
301	Mussel-Inspired Adhesive Double-Network Hydrogel for Intraoral Ultrasound Imaging.. <i>ACS Applied Bio Materials</i> , <b>2020</b> , 3, 8943-8952	4.1	4
300	Temperature-Induced Transition from Indirect to Direct Adsorption of Polycyclic Aromatic Hydrocarbons on Quartz: A Combined Theoretical and Experimental Study. <i>Industrial &amp; Engineering Chemistry Research</i> , <b>2020</b> , 59, 18500-18509	3.9	2
299	Structure of the Silica/Divalent Electrolyte Interface: Molecular Insight into Charge Inversion with Increasing pH. <i>Journal of Physical Chemistry C</i> , <b>2020</b> , 124, 26973-26981	3.8	12
298	Techniques for treating slop oil in oil and gas industry: A short review. <i>Fuel</i> , <b>2020</b> , 279, 118482	7.1	13
297	Functional Conductive Hydrogels for Bioelectronics <b>2020</b> , 2, 1287-1301		68
296	Destabilization of bitumen-coated fine solids in oil through water-assisted flocculation using biomolecules extracted from guar beans. <i>Petroleum Science</i> , <b>2020</b> , 17, 1726-1736	4.4	1
295	Integrated Nanoextraction and Colorimetric Reactions in Surface Nanodroplets for Combinative Analysis. <i>Analytical Chemistry</i> , <b>2020</b> , 92, 12442-12450	7.8	7
294	A Nanomechanical Study on Deciphering the Stickiness of SARS-CoV-2 on Inanimate Surfaces. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2020</b> , 12, 58360-58368	9.5	14
293	Mesoporous carbon xerogel material for the adsorption of model naphthenic acids: structure effect and kinetics modelling. <i>Environmental Technology (United Kingdom)</i> , <b>2020</b> , 41, 3534-3543	2.6	4
292	Probing the interaction mechanism between oil droplets with asphaltenes and solid surfaces using AFM. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 558, 173-181	9.3	24
291	CO/N-responsive oil-in-water emulsions using a novel switchable surfactant. <i>Journal of Colloid and Interface Science</i> , <b>2020</b> , 571, 134-141	9.3	16
290	Injectable and Self-Healing Nanocomposite Hydrogels with Ultrasensitive pH-Responsiveness and Tunable Mechanical Properties: Implications for Controlled Drug Delivery. <i>Biomacromolecules</i> , <b>2020</b> , 21, 2409-2420	6.9	51
289	Molecular Dynamics Study on the Mechanism of Graphene Oxide to Destabilize Oil/Water Emulsion. <i>Journal of Physical Chemistry C</i> , <b>2019</b> , 123, 22989-22999	3.8	19
288	Fundamentals and Advances in the Adhesion of Polymer Surfaces and Thin Films. <i>Langmuir</i> , <b>2019</b> , 35, 15914-15936	4	31
287	A wet adhesion strategy via synergistic cation and hydrogen bonding interactions of antifouling zwitterions and mussel-inspired binding moieties. <i>Journal of Materials Chemistry A</i> , <b>2019</b> , 7, 21944-21952 <sup>13</sup>		31

286	Probing the Self-Assembly and Nonlinear Friction Behavior of Confined Gold Nano-Particles. <i>Langmuir</i> , <b>2019</b> , 35, 15701-15709	4	4
285	Probing effects of molecular-level heterogeneity of surface hydrophobicity on hydrophobic interactions in air/water/solid systems. <i>Journal of Colloid and Interface Science</i> , <b>2019</b> , 557, 438-449	9.3	13
284	Adsorption of hydrophobically modified polyacrylamide P(AM-NaAA-C16DMAAC) on model coal and clay surfaces and the effect on selective flocculation of fine coal. <i>Minerals Engineering</i> , <b>2019</b> , 142, 105887	4.9	23
283	Selective separation of copper-molybdenum sulfides using humic acids. <i>Minerals Engineering</i> , <b>2019</b> , 133, 43-46	4.9	19
282	Mechanistic Understanding and Nanomechanics of Multiple Hydrogen-Bonding Interactions in Aqueous Environment. <i>Journal of Physical Chemistry C</i> , <b>2019</b> , 123, 4540-4548	3.8	7
281	Interaction Mechanisms of Zwitterions with Opposite Dipoles in Aqueous Solutions. <i>Langmuir</i> , <b>2019</b> , 35, 2842-2853	4	10
280	Stretchable, Injectable, and Self-Healing Conductive Hydrogel Enabled by Multiple Hydrogen Bonding toward Wearable Electronics. <i>Chemistry of Materials</i> , <b>2019</b> , 31, 4553-4563	9.6	194
279	A comparison study on adsorption and interaction behaviors of diluted bitumen and conventional crude oil on model mineral surface. <i>Fuel</i> , <b>2019</b> , 253, 383-391	7.1	7
278	Interfacial behavior and interaction mechanism of pentol/water interface stabilized with asphaltenes. <i>Journal of Colloid and Interface Science</i> , <b>2019</b> , 553, 341-349	9.3	19
277	Investigation of the Antifouling Mechanism of Electroless Nickel/Phosphorus Coating against Sand and Bitumen. <i>Energy &amp; Fuels</i> , <b>2019</b> , 33, 6350-6360	4.1	1
276	Probing the interactions of hydroxamic acid and mineral surfaces: Molecular mechanism underlying the selective separation. <i>Chemical Engineering Journal</i> , <b>2019</b> , 374, 123-132	14.7	31
275	Rapid Dewatering and Consolidation of Concentrated Colloidal Suspensions: Mature Fine Tailings via Self-Healing Composite Hydrogel. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2019</b> , 11, 21610-21618	9.5	12
274	Facile preparation of novel and active 2D nanosheets from non-layered and traditionally non-exfoliable earth-abundant materials. <i>Journal of Materials Chemistry A</i> , <b>2019</b> , 7, 15411-15419	13	19
273	Highly Porous, Hydrophobic, and Compressible Cellulose Nanocrystals/Poly(vinyl alcohol) Aerogels as Recyclable Absorbents for Oil/Water Separation. <i>ACS Sustainable Chemistry and Engineering</i> , <b>2019</b> , 7, 11118-11128	8.3	74
272	Adsorption characteristics and mechanisms of O-Carboxymethyl chitosan on chalcopyrite and molybdenite. <i>Journal of Colloid and Interface Science</i> , <b>2019</b> , 552, 659-670	9.3	30
271	Fouling mechanisms of asphaltenes and fine solids on bare and electroless nickel-phosphorus coated carbon steel. <i>Fuel</i> , <b>2019</b> , 252, 188-199	7.1	8
270	Polypyrrole-Doped Conductive Supramolecular Elastomer with Stretchability, Rapid Self-Healing, and Adhesive Property for Flexible Electronic Sensors. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2019</b> , 11, 18720-18729	9.5	91
269	Injectable, Self-Healing Hydrogel with Tunable Optical, Mechanical, and Antimicrobial Properties. <i>Chemistry of Materials</i> , <b>2019</b> , 31, 2366-2376	9.6	53

268	Co-aromatization of methane with propane over Zn/HZSM-5: The methane reaction pathway and the effect of Zn distribution. <i>Applied Catalysis B: Environmental</i> , <b>2019</b> , 250, 99-111	21.8	20
267	Hetero-difunctional Reagent with Superior Flotation Performance to Chalcopyrite and the Associated Surface Interaction Mechanism. <i>Langmuir</i> , <b>2019</b> , 35, 4353-4363	4	19
266	Insights into the Interfacial Process in Electroless Ni-P Coating on Supercritical CO Transport Pipeline as Relevant to Carbon Capture and Storage. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2019</b> , 11, 16243-16251	9.5	13
265	Tough and Alkaline-Resistant Mussel-Inspired Wet Adhesion with Surface Salt Displacement via Polydopamine/Amine Synergy. <i>Langmuir</i> , <b>2019</b> , 35, 5257-5263	4	21
264	Cost-Effective Strategy for Surface Modification via Complexation of Disassembled Polydopamine with Fe(III) Ions. <i>Langmuir</i> , <b>2019</b> , 35, 4101-4109	4	19
263	Unveiling the Critical Role of Surface Oxidation of Electroresponsive Behaviors in Two-Dimensional Ti <sub>3</sub> C <sub>2</sub> T <sub>x</sub> MXenes. <i>Journal of Physical Chemistry C</i> , <b>2019</b> , 123, 5479-5487	3.8	11
262	Nitrogen, Oxygen and Cobalt multiple-doped graphitized mesoporous carbon as a cost-effective carbon host with high sulfur content for lithium-sulfur batteries. <i>Journal of Alloys and Compounds</i> , <b>2019</b> , 787, 1356-1364	5.7	6
261	Probing fouling mechanism of naphthenic acids on forward osmosis polymer membranes in oil sands process water treatment. <i>Journal of Membrane Science</i> , <b>2019</b> , 576, 161-170	9.6	6
260	Flotation separation of Cu-Mo sulfides by O-Carboxymethyl chitosan. <i>Minerals Engineering</i> , <b>2019</b> , 134, 202-205	4.9	23
259	Metal oxide nanoparticle-modified graphene oxide for removal of elemental mercury. <i>Environmental Technology (United Kingdom)</i> , <b>2019</b> , 40, 3602-3610	2.6	5
258	Investigation on the flow-induced corrosion and degradation behavior of underground J55 pipe in a water production well in the Athabasca oil sands reservoir. <i>Journal of Petroleum Science and Engineering</i> , <b>2019</b> , 182, 106325	4.4	17
257	Probing the Interaction Forces of Phenol/Amine Deposition in Wet Adhesion: Impact of Phenol/Amine Mass Ratio and Surface Properties. <i>Langmuir</i> , <b>2019</b> , 35, 15639-15650	4	8
256	Engineering the morphology of TiO <sub>2</sub> /carbon hybrids via oxidized Ti <sub>3</sub> C <sub>2</sub> T <sub>x</sub> MXene and associated electrorheological activities. <i>Chemical Engineering Journal</i> , <b>2019</b> , 378, 122170	14.7	16
255	Probing the adsorption and interaction mechanisms of hydrophobically modified polyacrylamide P(AM-NaAA-C16DMAAC) on model coal surface: Impact of salinity. <i>Minerals Engineering</i> , <b>2019</b> , 141, 105841	4.9	10
254	Probing molecular interactions of PEGylated chitosan in aqueous solutions using a surface force apparatus. <i>Physical Chemistry Chemical Physics</i> , <b>2019</b> , 21, 20571-20581	3.6	7
253	Destabilization of fine solids suspended in oil media through wettability modification and water-assisted agglomeration. <i>Fuel</i> , <b>2019</b> , 254, 115623	7.1	9
252	Metformin attenuates hepatoma cell proliferation by decreasing glycolytic flux through the HIF-1 $\alpha$ /PFKFB3/PFK1 pathway. <i>Life Sciences</i> , <b>2019</b> , 239, 116966	6.8	30
251	Separation of talc and molybdenite: challenges and opportunities. <i>Minerals Engineering</i> , <b>2019</b> , 143, 105923	2.3	18

250	Multiresponsive and Self-Healing Hydrogel via Formation of Polymer-Nanogel Interfacial Dynamic Benzoxaborole Esters at Physiological pH. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2019</b> , 11, 44742-44750	8.5	21
249	Promoted electro-responsive performances in an interface-confined oxidized niobium carbide MXene. <i>Chemical Engineering Journal</i> , <b>2019</b> , 366, 321-329	14.7	41
248	A novel metal-organic layered material with superior supercapacitive performance through ultrafast and reversible tetraethylammonium intercalation. <i>Nano Energy</i> , <b>2019</b> , 59, 102-109	17.1	14
247	Corrosion Failure and Control of Carbon Steel and Anti-Corrosion Performance Evaluation of Candidate Materials in Thermal Applications <b>2019</b> ,		1
246	Constructing spraying-processed complementary smart windows via electrochromic materials with hierarchical nanostructures. <i>Journal of Materials Chemistry C</i> , <b>2019</b> , 7, 14855-14860	7.1	16
245	Unraveling the effects of CO <sub>2</sub> and H <sub>2</sub> S on the corrosion behavior of electroless Ni-P coating in CO <sub>2</sub> /H <sub>2</sub> S/Cl <sup>-</sup> environments at high temperature and high pressure. <i>Corrosion Science</i> , <b>2019</b> , 148, 317-330	6.8	38
244	Development of Self-Cross-Linked Soy Adhesive by Enzyme Complex from <i>Aspergillus niger</i> for Production of All-Biomass Composite Materials. <i>ACS Sustainable Chemistry and Engineering</i> , <b>2019</b> , 7, 3909-3916	8.3	41
243	A robust aqueous-processable polymer binder for long-life, high-performance lithium sulfur battery. <i>Energy Storage Materials</i> , <b>2019</b> , 21, 61-68	19.4	35
242	A novel comb-typed poly(oligo(ethylene glycol) methylether acrylate) as an excellent aqueous lubricant. <i>Journal of Colloid and Interface Science</i> , <b>2019</b> , 539, 342-350	9.3	17
241	Probing the Molecular Interactions and Lubrication Mechanisms of Purified Full-Length Recombinant Human Proteoglycan 4 (rhPRG4) and Hyaluronic Acid (HA). <i>Biomacromolecules</i> , <b>2019</b> , 20, 1056-1067	6.9	13
240	Mechanistic Investigation on Catalytic Deoxygenation of Phenol as a Model Compound of Biocrude Under Methane. <i>ACS Sustainable Chemistry and Engineering</i> , <b>2019</b> , 7, 1512-1523	8.3	11
239	Intermolecular and surface forces at solid/oil/water/gas interfaces in petroleum production. <i>Journal of Colloid and Interface Science</i> , <b>2019</b> , 537, 505-519	9.3	17
238	Understanding the stabilization mechanism of bitumen-coated fine solids in organic media from non-aqueous extraction of oil sands. <i>Fuel</i> , <b>2019</b> , 242, 255-264	7.1	16
237	Probing the Interaction Mechanism between Oil-in-Water Emulsions and Electroless Nickel-Phosphorus Coating with Implications for Antifouling in Oil Production. <i>Energy &amp; Fuels</i> , <b>2019</b> , 33, 3764-3775	4.1	8
236	Nature of Asphaltene Aggregates. <i>Energy &amp; Fuels</i> , <b>2019</b> , 33, 3694-3710	4.1	21
235	Unraveling the molecular interaction mechanism between graphene oxide and aromatic organic compounds with implications on wastewater treatment. <i>Chemical Engineering Journal</i> , <b>2019</b> , 358, 842-849	14.7	27
234	Novel Fe <sub>3</sub> O <sub>4</sub> based superhydrophilic core-shell microspheres for breaking asphaltene-stabilized water-in-oil emulsion. <i>Chemical Engineering Journal</i> , <b>2019</b> , 358, 869-877	14.7	45
233	Characterization of microstructure and properties of electroless duplex Ni-W-P/Ni-P nano-ZrO <sub>2</sub> composite coating. <i>Materials Today Physics</i> , <b>2018</b> , 4, 36-42	8	18

232	Effect of defect on corrosion behavior of electroless Ni-P coating in CO <sub>2</sub> -saturated NaCl solution. <i>Corrosion Science</i> , <b>2018</b> , 134, 23-37	6.8	35
231	Regenerable urchin-like FeO@PDA-Ag hollow microspheres as catalyst and adsorbent for enhanced removal of organic dyes. <i>Journal of Hazardous Materials</i> , <b>2018</b> , 350, 66-75	12.8	119
230	Novel N-doped ZrO with enhanced visible-light photocatalytic activity for hydrogen production and degradation of organic dyes.. <i>RSC Advances</i> , <b>2018</b> , 8, 6752-6758	3.7	18
229	Probing Anisotropic Surface Properties and Surface Forces of Fluorite Crystals. <i>Langmuir</i> , <b>2018</b> , 34, 25114-2521	4.2	51
228	A Molecular Dynamics Study of the Effect of Asphaltenes on Toluene/Water Interfacial Tension: Surfactant or Solute?. <i>Energy &amp; Fuels</i> , <b>2018</b> , 32, 3225-3231	4.1	21
227	Universal Mussel-Inspired Ultrastable Surface-Anchoring Strategy via Adaptive Synergy of Catechol and Cations. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2018</b> , 10, 2166-2173	9.5	33
226	Probing molecular interaction mechanisms of organic fouling on polyamide membrane using a surface forces apparatus: Implication for wastewater treatment. <i>Science of the Total Environment</i> , <b>2018</b> , 622-623, 644-654	10.2	12
225	Adsorption kinetics of asphaltenes at oil/water interface: Effects of concentration and temperature. <i>Fuel</i> , <b>2018</b> , 212, 387-394	7.1	82
224	Probing the Interaction Mechanism between Air Bubbles and Bitumen Surfaces in Aqueous Media Using Bubble Probe Atomic Force Microscopy. <i>Langmuir</i> , <b>2018</b> , 34, 729-738	4	31
223	A Quadruple-Hydrogen-Bonded Supramolecular Binder for High-Performance Silicon Anodes in Lithium-Ion Batteries. <i>Small</i> , <b>2018</b> , 14, e1801189	11	117
222	Scalable polyzwitterion-polydopamine coating for regenerable oil/water separation and underwater self-cleaning of stubborn heavy oil fouling without pre-hydration. <i>Chemical Communications</i> , <b>2018</b> , 54, 9734-9737	5.8	30
221	Modulation of Hydrophobic Interaction by Mediating Surface Nanoscale Structure and Chemistry, not Monotonically by Hydrophobicity. <i>Angewandte Chemie</i> , <b>2018</b> , 130, 12079-12084	3.6	7
220	An amphiphobic graphene-based hydrogel as oil-water separator and oil fence material. <i>Chemical Engineering Journal</i> , <b>2018</b> , 353, 708-716	14.7	36
219	Modulation of Hydrophobic Interaction by Mediating Surface Nanoscale Structure and Chemistry, not Monotonically by Hydrophobicity. <i>Angewandte Chemie - International Edition</i> , <b>2018</b> , 57, 11903-11908	16.4	50
218	Synthesis of Highly Biocompatible and Temperature-Responsive Physical Gels for Cryopreservation and 3D Cell Culture.. <i>ACS Applied Bio Materials</i> , <b>2018</b> , 1, 356-366	4.1	20
217	Reversible fabrication and self-assembly of a gemini supra-amphiphile driven by dynamic covalent bonds. <i>Soft Matter</i> , <b>2018</b> , 14, 5995-6000	3.6	4
216	Catalytic co-aromatization of methane and heptane as an alkane model compound over Zn-Ga/ZSM-5: A mechanistic study. <i>Applied Catalysis B: Environmental</i> , <b>2018</b> , 236, 13-24	21.8	32
215	Viscoelastic Surfactants with High Salt Tolerance, Fast-Dissolving Property, and Ultralow Interfacial Tension for Chemical Flooding in Offshore Oilfields. <i>Journal of Surfactants and Detergents</i> , <b>2018</b> , 21, 475-488	1.9	13

214	Interactions between micro-scale oil droplets in aqueous surfactant solution determined using optical tweezers. <i>Journal of Colloid and Interface Science</i> , <b>2018</b> , 532, 128-135	9.3	18
213	Probing molecular interactions between humic acid and surface-grafted polyacrylamide using quartz crystal microbalance with dissipation and atomic force microscopy: implications for environmental remediation. <i>Environmental Chemistry</i> , <b>2018</b> , 15, 336	3.2	3
212	Catalytic Valorization of Furfural under Methane Environment. <i>ACS Sustainable Chemistry and Engineering</i> , <b>2018</b> , 6, 8891-8903	8.3	13
211	Biofunctionalized silicon nitride platform for sensing applications. <i>Biosensors and Bioelectronics</i> , <b>2018</b> , 102, 497-503	11.8	7
210	Catalytic valorization of biomass derived glycerol under methane: Effect of catalyst synthesis method. <i>Fuel</i> , <b>2018</b> , 216, 218-226	7.1	12
209	Tuning protein adsorption on charged polyelectrolyte brushes via salinity adjustment. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , <b>2018</b> , 539, 37-45	5.1	13
208	Selective flotation separation of molybdenite and talc by humic substances. <i>Minerals Engineering</i> , <b>2018</b> , 117, 34-41	4.9	34
207	Material Selection for Thermal Inflow Control Device Manufacturing to Minimize the Silica and Calcium Carbonate Scaling Potential <b>2018</b> ,		2
206	Understanding Adsorption of Violanthrone-79 as a Model Asphaltene Compound on Quartz Surface Using Molecular Dynamics Simulations. <i>Journal of Physical Chemistry C</i> , <b>2018</b> , 122, 28787-28796	3.8	14
205	Efficient Fog Harvesting Based on 1D Copper Wire Inspired by the Plant Pitaya. <i>Langmuir</i> , <b>2018</b> , 34, 15259-15266	4.7	6
204	Protein-Resistant Property of Egg White Ovomucin under Different pHs and Ionic Strengths. <i>Journal of Agricultural and Food Chemistry</i> , <b>2018</b> , 66, 11034-11042	5.7	5
203	Direct catalytic co-conversion of cellulose and methane to renewable petrochemicals. <i>Catalysis Science and Technology</i> , <b>2018</b> , 8, 5632-5645	5.5	11
202	Magnesium-mechanochemical reduced SiO <sub>2</sub> for high-performance lithium ion batteries. <i>Journal of Power Sources</i> , <b>2018</b> , 407, 112-122	8.9	25
201	Rational Design of Self-Healing Tough Hydrogels: A Mini Review. <i>Frontiers in Chemistry</i> , <b>2018</b> , 6, 497	5	68
200	Anisotropic Polymer Adsorption on Molybdenite Basal and Edge Surfaces and Interaction Mechanism With Air Bubbles. <i>Frontiers in Chemistry</i> , <b>2018</b> , 6, 361	5	21
199	Aqueous-processable polymer binder with strong mechanical and polysulfide-trapping properties for high performance of lithium-sulfur batteries. <i>Journal of Materials Chemistry A</i> , <b>2018</b> , 6, 18660-18668	13	38
198	Standalone Sand Control Failure: Review of Slotted Liner, Wire Wrap Screen, and Premium Mesh Screen Failure Mechanism <b>2018</b> ,		10
197	Catalytic aromatization of acetone as a model compound for biomass-derived oil under a methane environment. <i>Catalysis Science and Technology</i> , <b>2018</b> , 8, 5104-5114	5.5	12

196	Biomimetic Lubrication and Surface Interactions of Dopamine-Assisted Zwitterionic Polyelectrolyte Coatings. <i>Langmuir</i> , <b>2018</b> , 34, 11593-11601	4	31
195	Effects of high pressure homogenization on faba bean protein aggregation in relation to solubility and interfacial properties. <i>Food Hydrocolloids</i> , <b>2018</b> , 83, 275-286	10.6	97
194	Spontaneous repairing liquid metal/Si nanocomposite as a smart conductive-additive-free anode for lithium-ion battery. <i>Nano Energy</i> , <b>2018</b> , 50, 359-366	17.1	64
193	Understanding the surface properties and rheology of a silica suspension mediated by a comb-type poly(acrylic acid)/poly(ethylene oxide) (PAA/PEO) copolymer: effect of salinity. <i>Soft Matter</i> , <b>2018</b> , 14, 4810-4819	3.6	3
192	Robust polymer nanofilms with bioengineering and environmental applications via facile and highly efficient covalent layer-by-layer assembly. <i>Journal of Materials Chemistry B</i> , <b>2018</b> , 6, 3742-3750	7.3	14
191	Mussel-Inspired Immobilization of Silver Nanoparticles toward Antimicrobial Cellulose Paper. <i>ACS Sustainable Chemistry and Engineering</i> , <b>2018</b> , 6, 9178-9188	8.3	69
190	Probing the Effect of Salt on Asphaltene Aggregation in Aqueous Solutions Using Molecular Dynamics Simulations. <i>Energy &amp; Fuels</i> , <b>2018</b> , 32, 8090-8097	4.1	3
189	Surface Interaction of Water-in-Oil Emulsion Droplets with Interfacially Active Asphaltenes. <i>Langmuir</i> , <b>2017</b> , 33, 1265-1274	4	81
188	Mapping the Nanoscale Heterogeneity of Surface Hydrophobicity on the Sphalerite Mineral. <i>Journal of Physical Chemistry C</i> , <b>2017</b> , 121, 5620-5628	3.8	34
187	Hierarchical Self-Assembly of Dopamine into Patterned Structures. <i>Advanced Materials Interfaces</i> , <b>2017</b> , 4, 1601218	4.6	11
186	Injectable Self-Healing Hydrogel with Antimicrobial and Antifouling Properties. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2017</b> , 9, 9221-9225	9.5	102
185	Surface Forces and Interaction Mechanisms of Emulsion Drops and Gas Bubbles in Complex Fluids. <i>Langmuir</i> , <b>2017</b> , 33, 3911-3925	4	72
184	Interaction Mechanisms between Air Bubble and Molybdenite Surface: Impact of Solution Salinity and Polymer Adsorption. <i>Langmuir</i> , <b>2017</b> , 33, 2353-2361	4	54
183	Methane Upgrading of Acetic Acid as a Model Compound for a Biomass-Derived Liquid over a Modified Zeolite Catalyst. <i>ACS Catalysis</i> , <b>2017</b> , 7, 3681-3692	13.1	36
182	Anticorrosion performance of chromized coating prepared by pack cementation in simulated solution with H <sub>2</sub> S and CO <sub>2</sub> . <i>Applied Surface Science</i> , <b>2017</b> , 419, 197-205	6.7	10
181	Probing the Effect of Salinity and pH on Surface Interactions between Air Bubbles and Hydrophobic Solids: Implications for Colloidal Assembly at Air/Water Interfaces. <i>Chemistry - an Asian Journal</i> , <b>2017</b> , 12, 1568-1577	4.5	18
180	Effect of Model Polycyclic Aromatic Compounds on the Coalescence of Water-in-Oil Emulsion Droplets. <i>Journal of Physical Chemistry C</i> , <b>2017</b> , 121, 10382-10391	3.8	19
179	Co-aromatization of olefin and methane over Ag-Ga/ZSM-5 catalyst at low temperature. <i>Applied Catalysis B: Environmental</i> , <b>2017</b> , 211, 275-288	21.8	46

178	Salt Triggers the Simple Coacervation of an Underwater Adhesive When Cations Meet Aromatic $\pi$ Electrons in Seawater. <i>ACS Nano</i> , <b>2017</b> , 11, 6764-6772	16.7	103
177	Wettability effect on nanoconfined water flow: Insights and perspectives. <i>Nano Today</i> , <b>2017</b> , 16, 7-8	17.9	25
176	pH-Dependent Inversion of Hofmeister Trends in the Water Structure of the Electrical Double Layer. <i>Journal of Physical Chemistry Letters</i> , <b>2017</b> , 8, 2855-2861	6.4	57
175	Filtration of Glycoprotein-Modified Carboxylated Polystyrene Microspheres as Cryptosporidium Oocysts Surrogates: Effects of Flow Rate, Alum, and Humic Acid. <i>Journal of Environmental Engineering, ASCE</i> , <b>2017</b> , 143, 04017032	2	3
174	Core cross-linked double hydrophilic block copolymer micelles based on multiple hydrogen-bonding interactions. <i>Polymer Chemistry</i> , <b>2017</b> , 8, 3066-3073	4.9	29
173	Polyamine-modified magnetic graphene oxide nanocomposite for enhanced selenium removal. <i>Separation and Purification Technology</i> , <b>2017</b> , 183, 249-257	8.3	40
172	Octadecyltrichlorosilane Deposition on Mica Surfaces: Insights into the Interface Interaction Mechanism. <i>Journal of Physical Chemistry B</i> , <b>2017</b> , 121, 3151-3161	3.4	23
171	Rapid copolymerization of canola oil derived epoxide monomers with anhydrides and carbon dioxide (CO <sub>2</sub> ). <i>Polymer Chemistry</i> , <b>2017</b> , 8, 6431-6442	4.9	5
170	Duplicating Dynamic Strain-Stiffening Behavior and Nanomechanics of Biological Tissues in a Synthetic Self-Healing Flexible Network Hydrogel. <i>ACS Nano</i> , <b>2017</b> , 11, 11074-11081	16.7	73
169	Deposition and Adhesion of Polydopamine on the Surfaces of Varying Wettability. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2017</b> , 9, 30943-30950	9.5	88
168	Probing interactions between sphalerite and hydrophobic/hydrophilic surfaces: Effect of water chemistry. <i>Powder Technology</i> , <b>2017</b> , 320, 511-518	5.2	13
167	Heterogeneous Distribution of Adsorbed Bitumen on Fine Solids from Solvent-Based Extraction of Oil Sands Probed by AFM. <i>Energy &amp; Fuels</i> , <b>2017</b> , 31, 8833-8842	4.1	13
166	Ultrafast colorimetric humidity-sensitive polyelectrolyte coating for touchless control. <i>Materials Horizons</i> , <b>2017</b> , 4, 72-82	14.4	45
165	Mechanistic Understanding of Asphaltene Surface Interactions in Aqueous Media. <i>Energy &amp; Fuels</i> , <b>2017</b> , 31, 3348-3357	4.1	28
164	Understanding the stability mechanisms of lentil legumin-like protein and polysaccharide foams. <i>Food Hydrocolloids</i> , <b>2016</b> , 61, 903-913	10.6	38
163	Long-Range Hydrophilic Attraction between Water and Polyelectrolyte Surfaces in Oil. <i>Angewandte Chemie</i> , <b>2016</b> , 128, 15241-15245	3.6	2
162	Molecular Weight Dependence of Synthetic Glycopolymers on Flocculation and Dewatering of Fine Particles. <i>Langmuir</i> , <b>2016</b> , 32, 11615-11622	4	15
161	Evaluation of an Advanced Metal Bonded Coating Technology for Improved SAGD Performance <b>2016</b> ,		1



160	Long-Range Hydrophilic Attraction between Water and Polyelectrolyte Surfaces in Oil. <i>Angewandte Chemie - International Edition</i> , <b>2016</b> , 55, 15017-15021	16.4	74
159	Molecular Interactions between a Biodegradable Demulsifier and Asphaltenes in an Organic Solvent. <i>Energy &amp; Fuels</i> , <b>2016</b> , 30, 10179-10186	4.1	8
158	Mechanistic Understanding of the Effect of Temperature and Salinity on the Water/Toluene Interfacial Tension. <i>Energy &amp; Fuels</i> , <b>2016</b> , 30, 10228-10235	4.1	19
157	In situ probing the self-assembly of 3-hexyl-4-amino-1,2,4-triazole-5-thione on chalcopyrite surfaces. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , <b>2016</b> , 511, 285-293	5.1	32
156	Nanomechanics of Poly(catecholamine) Coatings in Aqueous Solutions. <i>Angewandte Chemie</i> , <b>2016</b> , 128, 3403-3407	3.6	13
155	Probing Interactions between Air Bubble and Hydrophobic Polymer Surface: Impact of Solution Salinity and Interfacial Nanobubbles. <i>Langmuir</i> , <b>2016</b> , 32, 11236-11244	4	50
154	Reduction of Water/Oil Interfacial Tension by Model Asphaltenes: The Governing Role of Surface Concentration. <i>Journal of Physical Chemistry B</i> , <b>2016</b> , 120, 5646-54	3.4	70
153	Probing the Adsorption of Polycyclic Aromatic Compounds onto Water Droplets Using Molecular Dynamics Simulations. <i>Journal of Physical Chemistry C</i> , <b>2016</b> , 120, 14170-14179	3.8	15
152	Structural Evolutions of ZnS Nanoparticles in Hydrated and Bare States. <i>Journal of Physical Chemistry C</i> , <b>2016</b> , 120, 7870-7884	3.8	9
151	Complexation and coacervation of like-charged polyelectrolytes inspired by mussels. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2016</b> , 113, E847-53	11.5	150
150	Interaction Mechanism of Oil-in-Water Emulsions with Asphaltenes Determined Using Droplet Probe AFM. <i>Langmuir</i> , <b>2016</b> , 32, 2302-10	4	82
149	Fabrication of ultrathin conductive protein-based fibrous films and their thermal sensing properties. <i>Journal of Materials Chemistry A</i> , <b>2016</b> , 4, 4711-4717	13	5
148	Modeling of the Effect of Cell Deformation Associated with Microbubble Collision in Centrifugation Field. <i>Cellular and Molecular Bioengineering</i> , <b>2016</b> , 9, 162-174	3.9	2
147	Nanomechanical Contribution of Collagen and von Willebrand Factor A in Marine Underwater Adhesion and Its Implication for Collagen Manipulation. <i>Biomacromolecules</i> , <b>2016</b> , 17, 946-53	6.9	10
146	Understanding of physicochemical properties and formation mechanisms of fine particular matter generated from Canadian coal combustion. <i>Fuel</i> , <b>2016</b> , 165, 224-234	7.1	24
145	Marine mussel adhesion and bio-inspired wet adhesives. <i>Biotribology</i> , <b>2016</b> , 5, 44-51	2.3	62
144	CHAPTER 5: Intrinsic Self-Healing Polymeric Materials for Engineering and Environmental Applications. <i>RSC Smart Materials</i> , <b>2016</b> , 139-164	0.6	
143	Adhesion and Detachment Mechanisms between Polymer and Solid Substrate Surfaces: Using Polystyrene/Mica as a Model System. <i>Macromolecules</i> , <b>2016</b> , 49, 5223-5231	5.5	43

142	Nanomechanics of Poly(catecholamine) Coatings in Aqueous Solutions. <i>Angewandte Chemie - International Edition</i> , <b>2016</b> , 55, 3342-6	16.4	139
141	Comparison of the transport and deposition of <i>Pseudomonas aeruginosa</i> under aerobic and anaerobic conditions. <i>Water Resources Research</i> , <b>2016</b> , 52, 1127-1139	5.4	4
140	Sugary interfaces mitigate contact damage where stiff meets soft. <i>Nature Communications</i> , <b>2016</b> , 7, 11923-4	3.4	25
139	A two-step flocculation process on oil sands tailings treatment using oppositely charged polymer flocculants. <i>Science of the Total Environment</i> , <b>2016</b> , 565, 369-375	10.2	46
138	Role of Aqueous Phase Chemistry, Interfacial Film Properties, and Surface Coverage in Stabilizing Water-in-Bitumen Emulsions. <i>Energy &amp; Fuels</i> , <b>2016</b> , 30, 5240-5252	4.1	36
137	Probing Molecular Interactions of Asphaltenes in Heptol Using a Surface Forces Apparatus: Implications on Stability of Water-in-Oil Emulsions. <i>Langmuir</i> , <b>2016</b> , 32, 4886-95	4	53
136	Dendrimer functionalized graphene oxide for selenium removal. <i>Carbon</i> , <b>2016</b> , 105, 655-664	10.4	76
135	Probing the Reversible Fe <sup>3+</sup> +DOPA-Mediated Bridging Interaction in Mussel Foot Protein-1. <i>Journal of Physical Chemistry C</i> , <b>2016</b> , 120, 21670-21677	3.8	17
134	Self-Healing and Injectable Shear Thinning Hydrogels Based on Dynamic Oxaborole-Diol Covalent Cross-Linking. <i>ACS Biomaterials Science and Engineering</i> , <b>2016</b> , 2, 2315-2323	5.5	34
133	Probing Surface Interactions of Electrochemically Active Galena Mineral Surface Using Atomic Force Microscopy. <i>Journal of Physical Chemistry C</i> , <b>2016</b> , 120, 22433-22442	3.8	36
132	Interactions between elemental selenium and hydrophilic/hydrophobic surfaces: Direct force measurements using AFM. <i>Chemical Engineering Journal</i> , <b>2016</b> , 303, 646-654	14.7	34
131	Catalytic co-aromatization of ethanol and methane. <i>Applied Catalysis B: Environmental</i> , <b>2016</b> , 198, 480-492	2.8	37
130	Measuring forces and spatiotemporal evolution of thin water films between an air bubble and solid surfaces of different hydrophobicity. <i>ACS Nano</i> , <b>2015</b> , 9, 95-104	16.7	136
129	Interaction between Air Bubbles and Superhydrophobic Surfaces in Aqueous Solutions. <i>Langmuir</i> , <b>2015</b> , 31, 7317-27	4	64
128	A novel PKD2L1 C-terminal domain critical for trimerization and channel function. <i>Scientific Reports</i> , <b>2015</b> , 5, 9460	4.9	11
127	Development of electroless NiB/nano-WC composite coatings and investigation on its properties. <i>Surface and Coatings Technology</i> , <b>2015</b> , 277, 99-106	4.4	79
126	Impact of pH on molecular structure and surface properties of lentil legumin-like protein and its application as foam stabilizer. <i>Colloids and Surfaces B: Biointerfaces</i> , <b>2015</b> , 132, 45-53	6	68
125	Nanofibers: Clumping Criteria of Vertical Nanofibers on Surfaces (Adv. Mater. Interfaces 5/2015). <i>Advanced Materials Interfaces</i> , <b>2015</b> , 2,	4.6	1

124	Molecular and Surface Interactions between Polymer Flocculant Chitosan-g-polyacrylamide and Kaolinite Particles: Impact of Salinity. <i>Journal of Physical Chemistry C</i> , <b>2015</b> , 119, 7327-7339	3.8	52
123	Effects of salinity on xanthate adsorption on sphalerite and bubble-sphalerite interactions. <i>Minerals Engineering</i> , <b>2015</b> , 77, 34-41	4.9	28
122	Probing the adsorption of weak acids on graphite using amplitude modulation-frequency modulation atomic force microscopy. <i>Langmuir</i> , <b>2015</b> , 31, 3069-75	4	6
121	Clumping Criteria of Vertical Nanofibers on Surfaces. <i>Advanced Materials Interfaces</i> , <b>2015</b> , 2, 1400466	4.6	9
120	Simultaneous measurements of molecular forces and electro-optical properties of a confined 5CB liquid crystal film using a surface forces apparatus. <i>Langmuir</i> , <b>2015</b> , 31, 3965-72	4	5
119	Poly(acrylic acid) functionalized magnetic graphene oxide nanocomposite for removal of methylene blue. <i>RSC Advances</i> , <b>2015</b> , 5, 32272-32282	3.7	65
118	Cation-Interaction in DOPA-deficient mussel adhesive protein mfp-1. <i>Journal of Materials Chemistry B</i> , <b>2015</b> , 3, 738-743	7.3	67
117	Solvent Effects on the Formation of Surface Nanodroplets by Solvent Exchange. <i>Langmuir</i> , <b>2015</b> , 31, 12120-5	4	24
116	Probing Anisotropic Surface Properties of Molybdenite by Direct Force Measurements. <i>Langmuir</i> , <b>2015</b> , 31, 11409-18	4	49
115	Asialoglycoprotein Receptor-Mediated Gene Delivery to Hepatocytes Using Galactosylated Polymers. <i>Biomacromolecules</i> , <b>2015</b> , 16, 3008-20	6.9	51
114	Mussel-inspired antifouling coatings bearing polymer loops. <i>Chemical Communications</i> , <b>2015</b> , 51, 15780-3.8	3.8	74
113	Surface pressure affects B-hordein network formation at the air-water interface in relation to gastric digestibility. <i>Colloids and Surfaces B: Biointerfaces</i> , <b>2015</b> , 135, 784-792	6	8
112	The significant impact of polydopamine on the catalytic performance of the carried Au nanoparticles. <i>Chemical Communications</i> , <b>2015</b> , 51, 1469-71	5.8	67
111	Mussel-inspired hydrogels for biomedical and environmental applications. <i>Polymer Chemistry</i> , <b>2015</b> , 6, 353-358	4.9	143
110	Study of N-isopropoxypropyl-N'-ethoxycarbonyl thiourea adsorption on chalcopyrite using in situ SECM, ToF-SIMS and XPS. <i>Journal of Colloid and Interface Science</i> , <b>2015</b> , 437, 42-49	9.3	62
109	A size-dependent structural evolution of ZnS nanoparticles. <i>Scientific Reports</i> , <b>2015</b> , 5, 14267	4.9	26
108	Mussel Adhesives <b>2015</b> , 49-84		2
107	Structure and properties of water film adsorbed on mica surfaces. <i>Journal of Chemical Physics</i> , <b>2015</b> , 143, 104705	3.9	23

106	Adhesion and friction of an isolated gecko setal array: The effects of substrates and relative humidity. <i>Biosurface and Biotribology</i> , <b>2015</b> , 1, 42-49	1	14
105	Temperature- and pH-Responsive Benzoboroxole-Based Polymers for Flocculation and Enhanced Dewatering of Fine Particle Suspensions. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2015</b> , 7, 27176-87	9.5	27
104	Novel mussel-inspired injectable self-healing hydrogel with anti-biofouling property. <i>Advanced Materials</i> , <b>2015</b> , 27, 1294-9	24	387
103	Probing the interaction between air bubble and sphalerite mineral surface using atomic force microscope. <i>Langmuir</i> , <b>2015</b> , 31, 2438-46	4	65
102	Nanocomposites of graphene oxide, Ag nanoparticles, and magnetic ferrite nanoparticles for elemental mercury (Hg <sup>0</sup> ) removal. <i>RSC Advances</i> , <b>2015</b> , 5, 15634-15640	3.7	31
101	Real-time visualization of joint cavitation. <i>PLoS ONE</i> , <b>2015</b> , 10, e0119470	3.7	30
100	Recent experimental advances on hydrophobic interactions at solid/water and fluid/water interfaces. <i>Biointerphases</i> , <b>2015</b> , 11, 018903	1.8	30
99	Adhesion and Surface Interactions of a Self-Healing Polymer with Multiple Hydrogen-Bonding Groups. <i>Advanced Functional Materials</i> , <b>2014</b> , 24, 2322-2333	15.6	153
98	Understanding nanorheology and surface forces of confined thin films <b>2014</b> , 26, 3-14		17
97	Efficient removal of elemental mercury (Hg <sup>0</sup> ) by SBA-15-Ag adsorbents. <i>Journal of Materials Chemistry A</i> , <b>2014</b> , 2, 17730-17734	13	50
96	Probing the Hydrophobic Interaction between Air Bubbles and Partially Hydrophobic Surfaces Using Atomic Force Microscopy. <i>Journal of Physical Chemistry C</i> , <b>2014</b> , 118, 25000-25008	3.8	87
95	Understanding mechanisms of asphaltene adsorption from organic solvent on mica. <i>Langmuir</i> , <b>2014</b> , 30, 9370-7	4	48
94	Understanding interaction mechanisms between pentlandite and gangue minerals by zeta potential and surface force measurements. <i>Minerals Engineering</i> , <b>2014</b> , 69, 15-23	4.9	32
93	Probing anisotropic surface properties and interaction forces of chrysotile rods by atomic force microscopy and rheology. <i>Langmuir</i> , <b>2014</b> , 30, 10809-17	4	44
92	Highly regenerable mussel-inspired Fe <sub>3</sub> O <sub>4</sub> @polydopamine-Ag core-shell microspheres as catalyst and adsorbent for methylene blue removal. <i>ACS Applied Materials &amp; Interfaces</i> , <b>2014</b> , 6, 8845-52	9.5	329
91	Effect of peptide secondary structure on adsorption and adsorbed film properties on end-grafted polyethylene oxide layers. <i>Acta Biomaterialia</i> , <b>2014</b> , 10, 56-66	10.8	8
90	Properties and Characterization of Bioconjugates <b>2014</b> , 415-430		0
89	Water-dispersible magnetic nanoparticle-graphene oxide composites for selenium removal. <i>Carbon</i> , <b>2014</b> , 77, 710-721	10.4	139

88	In Vivo Residue-Specific Dopa-Incorporated Engineered Mussel Bioglue with Enhanced Adhesion and Water Resistance. <i>Angewandte Chemie</i> , <b>2014</b> , 126, 13578-13582	3.6	22
87	Characterizing factors affecting the hot liquid penetration performance of fabrics for protective clothing. <i>Textile Reseach Journal</i> , <b>2014</b> , 84, 174-186	1.7	16
86	In vivo residue-specific dopa-incorporated engineered mussel bioglue with enhanced adhesion and water resistance. <i>Angewandte Chemie - International Edition</i> , <b>2014</b> , 53, 13360-4	16.4	66
85	On the Size Distribution of Self-Associated Asphaltenes. <i>Energy &amp; Fuels</i> , <b>2013</b> , 27, 5083-5106	4.1	89
84	Construction of Smart Surfaces with polymer functionalized silica nanoparticles. <i>Polymer Chemistry</i> , <b>2013</b> , 4, 1038-1047	4.9	25
83	Fundamentals of Surface Adhesion, Friction, and Lubrication <b>2013</b> , 1-57		4
82	Lubrication and Wear Protection of Natural (Bio)Systems <b>2013</b> , 83-133		7
81	Polymer Brushes and Surface Forces <b>2013</b> , 135-176		7
80	Marine Bioadhesion on Polymer Surfaces and Strategies for Its Prevention <b>2013</b> , 227-281		2
79	Adhesion and Friction Mechanisms of Polymer Surfaces and Thin Films <b>2013</b> , 391-442		3
78	The Impact of Bacterial Surface Polymers on Bacterial Adhesion <b>2013</b> , 575-616		1
77	Recent advances in gecko adhesion and friction mechanisms and development of gecko-inspired dry adhesive surfaces. <i>Friction</i> , <b>2013</b> , 1, 114-129	5.6	102
76	Microbubble-Enhanced Cell Membrane Permeability in High Gravity Field. <i>Cellular and Molecular Bioengineering</i> , <b>2013</b> , 6, 266-278	3.9	3
75	Inhibiting Nonspecific Protein Adsorption: Mechanisms, Methods, and Materials <b>2013</b> , 45-61		1
74	Nanomechanics of cation-π Interactions in aqueous solution. <i>Angewandte Chemie - International Edition</i> , <b>2013</b> , 52, 3944-8	16.4	134
73	Understanding the effect of secondary structure on molecular interactions of poly-L-lysine with different substrates by SFA. <i>Biomacromolecules</i> , <b>2013</b> , 14, 3498-508	6.9	11
72	Interaction mechanism between hydrophobic and hydrophilic surfaces: using polystyrene and mica as a model system. <i>Langmuir</i> , <b>2013</b> , 29, 12443-51	4	50
71	Effect of solution salinity on settling of mineral tailings by polymer flocculants. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , <b>2013</b> , 430, 29-38	5.1	57

70	Effect of peptide secondary structure on adsorption and adsorbed film properties. <i>Acta Biomaterialia</i> , <b>2013</b> , 9, 6403-13	10.8	11
69	Adhesion, Wetting, and Superhydrophobicity of Polymeric Surfaces <b>2013</b> , 177-226		2
68	Adhesion, Friction, and Lubrication of Polymeric Nanoparticles and their Applications <b>2013</b> , 617-657		
67	Understanding Copper Activation and Xanthate Adsorption on Sphalerite by Time-of-Flight Secondary Ion Mass Spectrometry, X-ray Photoelectron Spectroscopy, and in Situ Scanning Electrochemical Microscopy. <i>Journal of Physical Chemistry C</i> , <b>2013</b> , 117, 20089-20097	3.8	45
66	Adhesion of mussel foot proteins to different substrate surfaces. <i>Journal of the Royal Society Interface</i> , <b>2013</b> , 10, 20120759	4.1	208
65	Marine mussel adhesion: biochemistry, mechanisms, and biomimetics. <i>Journal of Adhesion Science and Technology</i> , <b>2013</b> , 27, 2139-2162	2	82
64	Electrorheological and Magnetorheological Materials and Mechanical Properties <b>2013</b> , 659-689		1
63	Nanomechanics of Cation- $\pi$ Interactions in Aqueous Solution. <i>Angewandte Chemie</i> , <b>2013</b> , 125, 4036-4040	3.6	52
62	In situ kinetic study of zinc sulfide activation using a quartz crystal microbalance with dissipation (QCM-D). <i>Journal of Colloid and Interface Science</i> , <b>2012</b> , 368, 512-20	9.3	30
61	Effect of polycarboxylate ether comb-type polymer on viscosity and interfacial properties of kaolinite clay suspensions. <i>Journal of Colloid and Interface Science</i> , <b>2012</b> , 378, 222-31	9.3	48
60	Molecular interactions of mussel protective coating protein, mcfp-1, from <i>Mytilus californianus</i> . <i>Biomaterials</i> , <b>2012</b> , 33, 1903-11	15.6	82
59	Carbon capture and storage using alkaline industrial wastes. <i>Progress in Energy and Combustion Science</i> , <b>2012</b> , 38, 302-320	33.6	341
58	Anisotropic interfacial friction of inclined multiwall carbon nanotube array surface. <i>Carbon</i> , <b>2012</b> , 50, 5372-5379	10.4	19
57	Sliding Wear Behaviour of Nanocrystalline Fe <sub>88</sub> Si <sub>12</sub> Alloy Under Low Load and Speed. <i>Tribology Letters</i> , <b>2012</b> , 48, 329-335	2.8	8
56	Molecular interactions of a polyaromatic surfactant C5Pe in aqueous solutions studied by a surface forces apparatus. <i>Journal of Physical Chemistry B</i> , <b>2012</b> , 116, 11187-96	3.4	28
55	Probing Molecular and Surface Interactions of Comb-Type Polymer Polystyrene-graft-poly(ethylene oxide) (PS-g-PEO) with an SFA. <i>Journal of Physical Chemistry C</i> , <b>2012</b> , 116, 17554-17562	3.8	24
54	Probing Molecular Interactions of an Asphaltene Model Compound in Organic Solvents Using a Surface Forces Apparatus (SFA). <i>Energy &amp; Fuels</i> , <b>2012</b> , 26, 2591-2599	4.1	35
53	The effects of biofilm on the transport of stabilized zerovalent iron nanoparticles in saturated porous media. <i>Water Research</i> , <b>2012</b> , 46, 975-85	12.5	70

52	Adsorption of mercaptobenzoheterocyclic compounds on sulfide mineral surfaces: A density functional theory study of structure-reactivity relations. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , <b>2012</b> , 409, 1-9	5.1	51
51	Design of gecko-inspired fibrillar surfaces with strong attachment and easy-removal properties: a numerical analysis of peel-zone. <i>Journal of the Royal Society Interface</i> , <b>2012</b> , 9, 2424-36	4.1	20
50	Mussel foot protein-1 (mcfp-1) interaction with titania surfaces(). <i>Journal of Materials Chemistry</i> , <b>2012</b> , 22, 15530-15533		56
49	Adhesion mechanism in a DOPA-deficient foot protein from green mussels(). <i>Soft Matter</i> , <b>2012</b> , 8, 5640-5648	5.6	94
48	Hydrophobic interactions between polymer surfaces: using polystyrene as a model system. <i>Soft Matter</i> , <b>2012</b> , 8, 2746	3.6	92
47	Measurements of anisotropic (off-axis) friction-induced motion. <i>Advanced Materials</i> , <b>2012</b> , 24, 5236-41	2.4	18
46	Impact of cranberry juice on initial adhesion of the EPS producing bacterium <i>Burkholderia cepacia</i> . <i>Biofouling</i> , <b>2012</b> , 28, 417-31	3.3	6
45	Understanding the Deposition and Surface Interactions of Gypsum. <i>Journal of Physical Chemistry C</i> , <b>2011</b> , 115, 17485-17494	3.8	27
44	The Extended Peel Zone Model: Effect of Peeling Velocity <b>2011</b> , 87, 1045-1058		16
43	Understanding the molecular interactions of lipopolysaccharides during <i>E. coli</i> initial adhesion with a surface forces apparatus. <i>Soft Matter</i> , <b>2011</b> , 7, 9366	3.6	53
42	A new purification method for carbon nanotubes and associated atomic force microscope force-distance curve analysis. <i>Separation and Purification Technology</i> , <b>2011</b> , 81, 174-183	8.3	3
41	Understanding Molecular Interactions of Asphaltenes in Organic Solvents Using a Surface Force Apparatus. <i>Journal of Physical Chemistry C</i> , <b>2011</b> , 115, 16043-16051	3.8	71
40	Microtribology of Aqueous Carbon Nanotube Dispersions. <i>Advanced Functional Materials</i> , <b>2011</b> , 21, 4555-4564	5.5	25
39	Surface-induced patterns from evaporating droplets of aqueous carbon nanotube dispersions. <i>Langmuir</i> , <b>2011</b> , 27, 7163-7	4	40
38	Agricultural Wastes. <i>Water Environment Research</i> , <b>2011</b> , 83, 1439-1466	2.8	7
37	Reversible shear thickening at low shear rates of electrorheological fluids under electric fields. <i>Physical Review E</i> , <b>2011</b> , 83, 011401	2.4	34
36	Strong reversible Fe <sup>3+</sup> -mediated bridging between dopa-containing protein films in water. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2010</b> , 107, 12850-3	11.5	380
35	Protein- and metal-dependent interactions of a prominent protein in mussel adhesive plaques. <i>Journal of Biological Chemistry</i> , <b>2010</b> , 285, 25850-8	5.4	181

34	Liquid- to Solid-Like Failure Mechanism of Thin Polymer Films at Micro- and Nanoscales. <i>Macromolecules</i> , <b>2010</b> , 43, 538-542	5.5	19
33	Viscosity and interfacial properties in a mussel-inspired adhesive coacervate. <i>Soft Matter</i> , <b>2010</b> , 6, 3232-3236	3.6	181
32	Direct measurement of double-layer, van der Waals, and polymer depletion attraction forces between supported cationic bilayers. <i>Langmuir</i> , <b>2010</b> , 26, 14458-65	4	22
31	Recent advances in the surface forces apparatus (SFA) technique. <i>Reports on Progress in Physics</i> , <b>2010</b> , 73, 036601	14.4	393
30	Anisotropic dynamic changes in the pore network structure, fluid diffusion and fluid flow in articular cartilage under compression. <i>Biomaterials</i> , <b>2010</b> , 31, 3117-28	15.6	36
29	Force amplification response of actin filaments under confined compression. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2009</b> , 106, 445-9	11.5	22
28	Friction at the liquid/liquid interface of two immiscible polymer films. <i>Langmuir</i> , <b>2009</b> , 25, 4954-64	4	28
27	Formation of supported bilayers on silica substrates. <i>Langmuir</i> , <b>2009</b> , 25, 6997-7005	4	180
26	Gecko adhesion pad: a smart surface?. <i>Journal of Physics Condensed Matter</i> , <b>2009</b> , 21, 464132	1.8	63
25	Role of tilted adhesion fibrils (setae) in the adhesion and locomotion of gecko-like systems. <i>Journal of Physical Chemistry B</i> , <b>2009</b> , 113, 3615-21	3.4	61
24	The Crowding Model as a Tool to Understand and Fabricate Gecko-Inspired Dry Adhesives <b>2009</b> , 85, 512-525		17
23	Frictional adhesion of patterned surfaces and implications for gecko and biomimetic systems. <i>Langmuir</i> , <b>2009</b> , 25, 7486-95	4	67
22	New SFA techniques for studying surface forces and thin film patterns induced by electric fields. <i>Langmuir</i> , <b>2008</b> , 24, 1173-82	4	45
21	Adhesion and friction force coupling of gecko setal arrays: implications for structured adhesive surfaces. <i>Langmuir</i> , <b>2008</b> , 24, 1517-24	4	97
20	Transient interfacial patterns and instabilities associated with liquid film adhesion and spreading. <i>Langmuir</i> , <b>2007</b> , 23, 6126-35	4	15
19	Transient Surface Patterns and Instabilities at Adhesive Junctions of Viscoelastic Films. <i>Macromolecules</i> , <b>2007</b> , 40, 8409-8422	5.5	33
18	Peel-Zone Model of Tape Peeling Based on the Gecko Adhesive System <b>2007</b> , 83, 383-401		138
17	Transient filamentous network structure of a colloidal suspension excited by stepwise electric fields. <i>Physical Review E</i> , <b>2007</b> , 75, 011409	2.4	6



16	Transient surface patterns during adhesion and coalescence of thin liquid films. <i>Soft Matter</i> , <b>2006</b> , 3, 88-93	3.6	25
15	Adhesion and detachment mechanisms of sugar surfaces from the solid (glassy) to liquid (viscous) states. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2006</b> , 103, 19624-19629	11.5	13
14	Limit Cycles in Dynamic Adhesion and Friction Processes: A Discussion <b>2006</b> , 82, 933-943		28
13	Adhesion and friction in gecko toe attachment and detachment. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2006</b> , 103, 19320-5	11.5	471
12	Adhesion and Friction of Polystyrene Surfaces around T <sub>g</sub> . <i>Macromolecules</i> , <b>2006</b> , 39, 2350-2363	5.5	69
11	Recent progress in conductive self-healing hydrogels for flexible sensors. <i>Journal of Polymer Science</i> ,	2.4	4
10	A Universal Strategy for Constructing Robust and Antifouling Cellulose Nanocrystal Coating. <i>Advanced Functional Materials</i> , 2109989	15.6	7
9	Polymers, Adhesion, and Paper Materials 501-543		
8	Recent Advances in Rubber Friction in the Context of Tire Traction 443-499		1
7	Carbohydrates and their Roles in Biological Recognition Processes 545-574		
6	Nanoconfining Cation- $\pi$ Interactions as a Modular Strategy to Construct Injectable Self-Healing Hydrogel. <i>CCS Chemistry</i> , 1-45	7.2	11
5	Adhesion and Tribological Characteristics of Ion-Containing Polymer Brushes Prepared by Controlled Radical Polymerization 59-82		2
4	Molecular Engineering of Peptides for Cellular Adhesion Control 283-317		1
3	A Microcosm of Wet Adhesion: Dissecting Protein Interactions in Mussel Attachment Plaques 319-349		3
2	Gecko-Inspired Polymer Adhesives 351-389		9
1	Hydrogels for the removal of the methylene blue dye from wastewater: a review. <i>Environmental Chemistry Letters</i> , 1	13.3	0