

Martin F Jarrold

List of Publications by Citations

Source: <https://exaly.com/author-pdf/997559/martin-f-jarrold-publications-by-citations.pdf>

Version: 2024-04-27

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.

229
papers

14,030
citations

60
h-index

108
g-index

235
ext. papers

14,925
ext. citations

8.8
avg, IF

6.59
L-index

#	Paper	IF	Citations
229	An exact hard-spheres scattering model for the mobilities of polyatomic ions. <i>Chemical Physics Letters</i> , 1996 , 261, 86-91	2.5	708
228	Ion Mobility Measurements and their Applications to Clusters and Biomolecules 1997 , 32, 577-592		633
227	Structures of medium-sized silicon clusters. <i>Nature</i> , 1998 , 392, 582-585	50.4	579
226	Naked Protein Conformations: Cytochrome c in the Gas Phase. <i>Journal of the American Chemical Society</i> , 1995 , 117, 10141-10142	16.4	429
225	Protein Structure in Vacuo: Gas-Phase Conformations of BPTI and Cytochrome c. <i>Journal of the American Chemical Society</i> , 1997 , 119, 2240-2248	16.4	376
224	Silicon cluster ions: Evidence for a structural transition. <i>Physical Review Letters</i> , 1991 , 67, 2994-2997	7.4	339
223	Peptides and proteins in the vapor phase. <i>Annual Review of Physical Chemistry</i> , 2000 , 51, 179-207	15.7	325
222	Integrative structure and functional anatomy of a nuclear pore complex. <i>Nature</i> , 2018 , 555, 475-482	50.4	280
221	Solid clusters above the bulk melting point. <i>Physical Review Letters</i> , 2000 , 85, 2530-2	7.4	247
220	An IMS-IMS analogue of MS-MS. <i>Analytical Chemistry</i> , 2006 , 78, 4161-74	7.8	221
219	Collision induced dissociation of metal cluster ions: Bare aluminum clusters, Al _n (n=3-6). <i>Journal of Chemical Physics</i> , 1987 , 86, 3876-3885	3.9	219
218	Hot and solid gallium clusters: too small to melt. <i>Physical Review Letters</i> , 2003 , 91, 215508	7.4	200
217	Conformations, Unfolding, and Refolding of Apomyoglobin in Vacuum: An Activation Barrier for Gas-Phase Protein Folding. <i>Journal of the American Chemical Society</i> , 1997 , 119, 2987-2994	16.4	182
216	Dissociation of large silicon clusters: the approach to bulk behavior. <i>The Journal of Physical Chemistry</i> , 1991 , 95, 9181-9185		177
215	Drift Tube Studies of Atomic Clusters. <i>The Journal of Physical Chemistry</i> , 1995 , 99, 11-21		176
214	Mobilities of silicon cluster ions: The reactivity of silicon sausages and spheres. <i>Journal of Chemical Physics</i> , 1992 , 96, 9180-9190	3.9	174
213	Ionization of medium-sized silicon clusters and the geometries of the cations. <i>Journal of Chemical Physics</i> , 1998 , 109, 9401-9409	3.9	161

212	Unfolding, Refolding, and Hydration of Proteins in the Gas Phase. <i>Accounts of Chemical Research</i> , 1999 , 32, 360-367	24.3	161
211	Design of Helices That Are Stable in Vacuo. <i>Journal of the American Chemical Society</i> , 1998 , 120, 12974-12975	26.75	155
210	Melting, premelting, and structural transitions in size-selected aluminum clusters with around 55 atoms. <i>Physical Review Letters</i> , 2005 , 94, 173401	7.4	150
209	Helix Formation in Unsolvated Alanine-Based Peptides: Helical Monomers and Helical Dimers. <i>Journal of the American Chemical Society</i> , 1999 , 121, 3494-3501	16.4	144
208	Structures of Silicon-Doped Carbon Clusters. <i>Journal of Physical Chemistry A</i> , 1997 , 101, 1836-1840	2.8	140
207	High-resolution ion mobility measurements for silicon cluster anions and cations. <i>Journal of Chemical Physics</i> , 1999 , 111, 7865-7870	3.9	129
206	Modeling ionic mobilities by scattering on electronic density isosurfaces: Application to silicon cluster anions. <i>Journal of Chemical Physics</i> , 2000 , 112, 4517-4526	3.9	120
205	Mobilities of carbon cluster ions: Critical importance of the molecular attractive potential. <i>Journal of Chemical Physics</i> , 1998 , 108, 2416-2423	3.9	120
204	Helices and Sheets in vacuo. <i>Physical Chemistry Chemical Physics</i> , 2007 , 9, 1659-71	3.6	119
203	Nanocrystalline Aggregation of Serine Detected by Electrospray Ionization Mass Spectrometry: Origin of the Stable Homochiral Gas-Phase Serine Octamer. <i>Journal of Physical Chemistry B</i> , 2002 , 106, 1219-1228	3.4	118
202	Structures of Germanium Clusters: Where the Growth Patterns of Silicon and Germanium Clusters Diverge. <i>Physical Review Letters</i> , 1999 , 83, 2167-2170	7.4	117
201	A detailed study of the reactions between size selected aluminum cluster ions, Al _n (n=3-6), and oxygen. <i>Journal of Chemical Physics</i> , 1987 , 87, 5728-5738	3.9	116
200	Structural information from ion mobility measurements: applications to semiconductor clusters. <i>Chemical Society Reviews</i> , 2001 , 30, 26-35	58.5	111
199	Physical and chemical evidence for metallofullerenes with metal atoms as part of the cage. <i>Nature</i> , 1994 , 372, 248-250	50.4	107
198	High resolution ion mobility measurements for gas phase proteins: correlation between solution phase and gas phase conformations. <i>International Journal of Mass Spectrometry and Ion Processes</i> , 1997 , 165-166, 497-507		104
197	Detection of late intermediates in virus capsid assembly by charge detection mass spectrometry. <i>Journal of the American Chemical Society</i> , 2014 , 136, 3536-41	16.4	103
196	Melting and freezing of metal clusters. <i>Annual Review of Physical Chemistry</i> , 2011 , 62, 151-72	15.7	100
195	Photodissociation kinetics of aluminum cluster ions: Determination of cluster dissociation energies. <i>Journal of Chemical Physics</i> , 1989 , 91, 2912-2921	3.9	98

194	Charge separation in the aerodynamic breakup of micrometer-sized water droplets. <i>Journal of Physical Chemistry A</i> , 2008 , 112, 13352-63	2.8	95
193	Tin clusters adopt prolate geometries. <i>Physical Review A</i> , 1999 , 60, 1235-1239	2.6	93
192	Conformations of Gly(n)H ⁺ and Ala(n)H ⁺ peptides in the gas phase. <i>Biophysical Journal</i> , 1999 , 76, 1591-72.9		92
191	Annealing and dissociation of carbon rings. <i>Journal of Chemical Physics</i> , 1993 , 99, 1785-1795	3.9	90
190	Gallium cluster "magic melters". <i>Journal of the American Chemical Society</i> , 2004 , 126, 8628-9	16.4	88
189	Thermal Unfolding of Unsolvated Cytochrome c: Experiment and Molecular Dynamics Simulations. <i>Journal of the American Chemical Society</i> , 1999 , 121, 2712-2721	16.4	87
188	Chemistry of semiconductor clusters: Large silicon clusters are much less reactive towards oxygen than the bulk. <i>Journal of Chemical Physics</i> , 1990 , 93, 224-229	3.9	86
187	Permanent electric dipole and conformation of unsolvated tryptophan. <i>Journal of the American Chemical Society</i> , 2001 , 123, 8440-1	16.4	83
186	Denaturation and Refolding of Cytochrome c in Vacuo. <i>Journal of the American Chemical Society</i> , 1996 , 118, 10313-10314	16.4	79
185	Raman spectra and calculated vibrational frequencies of size-selected C ₁₆ , C ₁₈ , and C ₂₀ clusters. <i>Journal of Chemical Physics</i> , 1998 , 109, 9652-9655	3.9	73
184	Charge detection mass spectrometry for single ions with a limit of detection of 30 charges. <i>International Journal of Mass Spectrometry</i> , 2013 , 345-347, 153-159	1.9	71
183	Extreme stability of an unsolvated alpha-helix. <i>Journal of the American Chemical Society</i> , 2004 , 126, 7420-16.4	16.4	69
182	Annealing of silicon clusters. <i>Journal of the American Chemical Society</i> , 1992 , 114, 459-464	16.4	69
181	Resolving Adeno-Associated Viral Particle Diversity With Charge Detection Mass Spectrometry. <i>Analytical Chemistry</i> , 2016 , 88, 6718-25	7.8	68
180	Charge detection mass spectrometry with resolved charge states. <i>Journal of the American Society for Mass Spectrometry</i> , 2013 , 24, 101-8	3.5	68
179	Dissociation Energies of Silicon Clusters: A Depth Gauge for the Global Minimum on the Potential Energy Surface. <i>Physical Review Letters</i> , 1998 , 81, 4616-4619	7.4	68
178	Small carbon rings: dissociation, isomerization, and a simple model based on strain. <i>International Journal of Mass Spectrometry and Ion Processes</i> , 1994 , 138, 17-31		68
177	Energy disposal in photodissociation from magic angle measurements with a crossed high-energy ion beam and laser beam: Photodissociation dynamics of the (N ₂) ₂ cluster in the 458-14 nm range. <i>Journal of Chemical Physics</i> , 1984 , 81, 214-221	3.9	68

176	Transition from covalent to metallic behavior in group-14 clusters. <i>Chemical Physics Letters</i> , 2000 , 317, 615-618	2.5	67
175	Ion-molecule association reactions: reaction sequences initiated by protonated methanol (MeOH ₂ ⁺) in methanol; experiment and theory. <i>Journal of the American Chemical Society</i> , 1983 , 105, 7024-7033	16.4	66
174	Reactions of silicon cluster ions, Si _n (n=10-15), with water. <i>Journal of Chemical Physics</i> , 1991 , 94, 2631-2639	6.3	65
173	Charge transfer half-collisions: Photodissociation of the Kr ⁺ O ₂ cluster ion with resolution of the O ₂ product vibrational states. <i>Journal of Chemical Physics</i> , 1984 , 81, 4369-4379	3.9	65
172	Charge Detection Mass Spectrometry with Almost Perfect Charge Accuracy. <i>Analytical Chemistry</i> , 2015 , 87, 10330-7	7.8	64
171	Structural Transitions in Sodium Chloride Nanocrystals. <i>Physical Review Letters</i> , 1997 , 78, 4213-4216	7.4	63
170	Hydration of Gas Phase Proteins: Folded +5 and Unfolded +7 Charge States of Cytochrome c. <i>Journal of Physical Chemistry B</i> , 1997 , 101, 847-851	3.4	61
169	Hepatitis B Virus Capsid Completion Occurs through Error Correction. <i>Journal of the American Chemical Society</i> , 2017 , 139, 16932-16938	16.4	60
168	Helix unfolding in unsolvated peptides. <i>Journal of the American Chemical Society</i> , 2001 , 123, 5660-7	16.4	59
167	Interaction of silicon cluster ions with ammonia: Annealing, equilibria, high temperature kinetics, and saturation studies. <i>Journal of Chemical Physics</i> , 1991 , 94, 3607-3618	3.9	57
166	High-resolution ion mobility studies of sodium chloride nanocrystals. <i>Chemical Physics Letters</i> , 1997 , 267, 186-192	2.5	56
165	Metal-Ion Enhanced Helicity in the Gas Phase. <i>Journal of the American Chemical Society</i> , 2000 , 122, 12377-12378	6.3	56
164	Structural Elucidation of Fullerene Dimers by High-Resolution Ion Mobility Measurements and Trajectory Calculation Simulations. <i>Journal of Physical Chemistry A</i> , 1997 , 101, 1684-1688	2.8	55
163	Mobilities of metal cluster ions: Aluminum and the electronic shell model. <i>Journal of Chemical Physics</i> , 1993 , 98, 2399-2407	3.9	55
162	Hydration of Gas-Phase Proteins: A Special Hydration Site on Gas-Phase BPTI. <i>Journal of the American Chemical Society</i> , 1997 , 119, 9586-9587	16.4	54
161	Melting transitions in aluminum clusters: The role of partially melted intermediates. <i>Physical Review B</i> , 2007 , 76,	3.3	54
160	Optical spectroscopy of metal clusters: Cu ₄ ⁺ . <i>Chemical Physics Letters</i> , 1990 , 166, 116-122	2.5	54
159	Photodissociation of the dimanganese ion: Mn ₂ ⁺ : a route to the energetics of metal clusters. <i>Journal of the American Chemical Society</i> , 1985 , 107, 7339-7344	16.4	54

- 158 Hydration of Folded and Unfolded Gas-Phase Proteins: Saturation of Cytochrome c and Apomyoglobin. *Journal of the American Chemical Society*, **1998**, 120, 1327-1328 16.4 53
- 157 Conformations of Unsolvated Valine-Based Peptides. *Journal of the American Chemical Society*, **2000**, 122, 9243-9256 16.4 53
- 156 The reactions of mass selected aluminum cluster ions, Al_n (n=405), with oxygen. *Journal of Chemical Physics*, **1986**, 85, 5373-5375 3.9 53
- 155 Correlation between the latent heats and cohesive energies of metal clusters. *Journal of Chemical Physics*, **2008**, 129, 144702 3.9 52
- 154 The initial steps in the hydration of unsolvated peptides: water molecule adsorption on alanine-based helices and globules. *Journal of the American Chemical Society*, **2002**, 124, 11148-58 16.4 52
- 153 The formation and reactivity of HOC⁺: Interstellar implications. *Journal of Chemical Physics*, **1985**, 83, 1121-1131 3.9 51
- 152 Ion funnels for the masses: experiments and simulations with a simplified ion funnel. *Journal of the American Society for Mass Spectrometry*, **2005**, 16, 1708-12 3.5 50
- 151 Molecular Dynamics Simulations of the Charge-Induced Unfolding and Refolding of Unsolvated Cytochrome c. *Journal of Physical Chemistry B*, **1999**, 103, 10017-10021 3.4 50
- 150 Ion-molecule association reactions: A study of the temperature dependence of the reaction N₂⁺+N₂+M → N₂⁺+M for M=N₂, Ne, and He: Experiment and theory. *Journal of Chemical Physics*, **1984**, 81, 288-297 3.9 50
- 149 Charge detection mass spectrometry: weighing heavier things. *Analyst, The*, **2017**, 142, 1654-1671 5 49
- 148 Observation of "Stick" and "Handle" intermediates along the fullerene road. *Physical Review Letters*, **2000**, 84, 2421-4 7.4 49
- 147 Investigation of the dynamics and energy disposal in the photodissociation of small ion clusters using a high-energy ion beam crossed with a laser beam: Photodissociation of (NO)₂⁺. in the 488-600 nm range. *Journal of Chemical Physics*, **1983**, 79, 6086-6096 3.9 49
- 146 Chemistry of semiconductor clusters: reactions of Si_n⁺ (n = 11-50) with ethylene show evidence for numerous structural isomers. *Journal of the American Chemical Society*, **1990**, 112, 3768-3773 16.4 48
- 145 Electronic effects on melting: comparison of aluminum cluster anions and cations. *Journal of Chemical Physics*, **2009**, 131, 044307 3.9 47
- 144 Electric susceptibility of unsolvated glycine-based peptides. *Journal of the American Chemical Society*, **2002**, 124, 6737-41 16.4 47
- 143 Gas-Phase Zwitterions in the Absence of a Net Charge. *Journal of Physical Chemistry A*, **2004**, 108, 10861-10864 16.4 46
- 142 Properties of deposited size-selected clusters: Reactivity of deposited silicon clusters. *Journal of Chemical Physics*, **1992**, 97, 8312-8321 3.9 46
- 141 Chemisorption on size-selected metal clusters: activation barriers and chemical reactions for deuterium on aluminum cluster ions. *Journal of the American Chemical Society*, **1988**, 110, 70-78 16.4 46

140	Single-molecule mass spectrometry. <i>Mass Spectrometry Reviews</i> , 2017 , 36, 715-733	11	45
139	Melting dramatically enhances the reactivity of aluminum nanoclusters. <i>Journal of the American Chemical Society</i> , 2009 , 131, 2446-7	16.4	44
138	One ring to bind them all: shape-selective complexation of phenylenediamine isomers with cucurbit[6]uril in the gas phase. <i>Journal of Physical Chemistry A</i> , 2009 , 113, 989-97	2.8	44
137	One Water Molecule Stiffens a Protein. <i>Journal of the American Chemical Society</i> , 2000 , 122, 2950-2951	16.4	44
136	Synthesis and Temperature-Dependence of Hydrogen-Terminated Silicon Clusters. <i>Journal of Physical Chemistry B</i> , 2001 , 105, 4188-4194	3.4	43
135	Metal-Containing Carbon Clusters: Structures, Isomerization, and Formation of NbC _n ⁺ Clusters. <i>Journal of the American Chemical Society</i> , 1995 , 117, 8841-8850	16.4	43
134	Charge detection mass spectrometry of bacteriophage P22 procapsid distributions above 20 MDa. <i>Rapid Communications in Mass Spectrometry</i> , 2014 , 28, 483-8	2.2	42
133	Gas-phase self-assembly of endohedral metallofullerenes. <i>Nature</i> , 1994 , 367, 718-720	50.4	42
132	Collision induced dissociation of aluminum cluster ions with chemisorbed oxygen, Al _n O _m (n=3-26, m=1,2): Influence of electronic structure on stability. <i>Journal of Chemical Physics</i> , 1987 , 87, 1610-1619	3.9	42
131	Ion calorimetry: Using mass spectrometry to measure melting points. <i>Journal of the American Society for Mass Spectrometry</i> , 2007 , 18, 74-81	3.5	41
130	Second-order phase transitions in amorphous gallium clusters. <i>Journal of Physical Chemistry B</i> , 2005 , 109, 16575-8	3.4	41
129	Tin clusters that do not melt: Calorimetry measurements up to 650K. <i>Physical Review B</i> , 2005 , 71,	3.3	41
128	Interaction of silicon cluster ions with ammonia: The kinetics. <i>Journal of Chemical Physics</i> , 1990 , 93, 5709-5718	3.5	41
127	Kinetics of ion-molecule collision complexes in the gas phase. Experiment and theory. <i>Faraday Discussions of the Chemical Society</i> , 1983 , 75, 57-76		41
126	Charge Detection Mass Spectrometry for Single Ions with an Uncertainty in the Charge Measurement of 0.65%. <i>Journal of the American Society for Mass Spectrometry</i> , 2015 , 26, 1213-20	3.5	39
125	Activation of dinitrogen by solid and liquid aluminum nanoclusters: a combined experimental and theoretical study. <i>Journal of the American Chemical Society</i> , 2010 , 132, 12906-18	16.4	39
124	Entropic stabilization of isolated beta-sheets. <i>Journal of the American Chemical Society</i> , 2005 , 127, 4675-4684	16.4	39
123	The smallest fullerene. <i>Nature</i> , 2000 , 407, 26-7	50.4	39

122	Measurement of the accurate mass of a 50 MDa infectious virus. <i>Rapid Communications in Mass Spectrometry</i> , 2016 , 30, 1957-62	2.2	38
121	Water molecule adsorption on short alanine peptides: how short is the shortest gas-phase alanine-based helix?. <i>Journal of the American Chemical Society</i> , 2004 , 126, 8454-8	16.4	38
120	Metal Ion Interactions with Polyalanine Peptides. <i>Journal of Physical Chemistry B</i> , 2004 , 108, 6093-6097	3.4	38
119	Probing higher order multimers of pyruvate kinase with charge detection mass spectrometry. <i>International Journal of Mass Spectrometry</i> , 2013 , 337, 50-56	1.9	37
118	On the formation of HCO ⁺ and HOC ⁺ from the reaction between H ₃ and CO. <i>Journal of Chemical Physics</i> , 1982 , 77, 5847-5848	3.9	37
117	Multiple Pathways in Capsid Assembly. <i>Journal of the American Chemical Society</i> , 2018 , 140, 5784-5790	16.4	36
116	Conformations of Unsolvated Glycine-Based Peptides. <i>Journal of Physical Chemistry B</i> , 2000 , 104, 2154-2158	3.4	36
115	Melting of size-selected aluminum nanoclusters with 84-128 atoms. <i>Journal of Chemical Physics</i> , 2010 , 132, 034302	3.9	35
114	Pulsed acceleration charge detection mass spectrometry: application to weighing electrosprayed droplets. <i>Analytical Chemistry</i> , 2007 , 79, 8431-9	7.8	35
113	All-atom generalized-ensemble simulations of small proteins. <i>Journal of Molecular Graphics and Modelling</i> , 2004 , 22, 397-403	2.8	35
112	Ball-and-Chain Dimers from a Hot Fullerene Plasma. <i>Journal of Physical Chemistry A</i> , 1999 , 103, 5275-5284	4.8	35
111	Acquiring Structural Information on Virus Particles with Charge Detection Mass Spectrometry. <i>Journal of the American Society for Mass Spectrometry</i> , 2016 , 27, 1028-36	3.5	33
110	Charge Detection Mass Spectrometry Identifies Preferred Non-Icosahedral Polymorphs in the Self-Assembly of Woodchuck Hepatitis Virus Capsids. <i>Journal of Molecular Biology</i> , 2016 , 428, 292-300	6.5	32
109	Image charge detection mass spectrometry: pushing the envelope with sensitivity and accuracy. <i>Analytical Chemistry</i> , 2011 , 83, 950-6	7.8	32
108	Photodissociation of copper clusters, Cu _n (n = 3B), in the 370-10 nm wavelength region. <i>International Journal of Mass Spectrometry and Ion Processes</i> , 1990 , 102, 161-181		32
107	Negative droplets from positive electrospray. <i>Journal of Physical Chemistry A</i> , 2006 , 110, 12607-12	2.8	31
106	Carbon Clusters Containing Two Metal Atoms: Structures, Growth Mechanism, and Fullerene Formation. <i>Journal of the American Chemical Society</i> , 1996 , 118, 1139-1147	16.4	31
105	Bonding of Metals to Carbon Rings: LaC _n ⁺ Isomers with La ⁺ Inserted and Attached to the Ring. <i>Journal of the American Chemical Society</i> , 1994 , 116, 5971-5972	16.4	31

104	Photodissociation of metal cluster ions. Dissociation energies and optical spectroscopy. <i>Journal of the Chemical Society, Faraday Transactions</i> , 1990 , 86, 2537		31
103	The dynamics of photodissociation of cluster ions. II. Photodissociation of the (NO) ₃ cluster in the visible wavelength range. <i>Journal of Chemical Physics</i> , 1984 , 81, 222-230	3.9	31
102	Melting of Aluminum Cluster Cations with 31-48 Atoms: Experiment and Theory. <i>Journal of Physical Chemistry C</i> , 2007 , 111, 17788-17794	3.8	30
101	Evidence for High T _c Superconducting Transitions in Isolated Al ₅ and Al ₇ Nanoclusters. <i>Journal of Superconductivity and Novel Magnetism</i> , 2008 , 21, 163-166	1.5	30
100	Melting, freezing, sublimation, and phase coexistence in sodium chloride nanocrystals. <i>Journal of Chemical Physics</i> , 2004 , 121, 6502-7	3.9	30
99	Water molecule adsorption on protonated dipeptides. <i>Journal of the American Chemical Society</i> , 2004 , 126, 1206-13	16.4	30
98	Unimolecular and bimolecular reactions in the C ₄ H ₆ ⁺ system: Experiment and theory. <i>Journal of Chemical Physics</i> , 1983 , 78, 3756-3766	3.9	30
97	Melting of size-selected gallium clusters with 60-183 atoms. <i>Journal of Physical Chemistry A</i> , 2014 , 118, 4900-6	2.8	29
96	High-resolution ion mobility measurements of indium clusters: electron spill-out in metal cluster anions and cations. <i>Chemical Physics Letters</i> , 1999 , 304, 19-22	2.5	29
95	Drift Tube Studies of Large Carbon Clusters: New Isomers and the Mechanism of Giant Fullerene Formation. <i>Journal of the American Chemical Society</i> , 1995 , 117, 10317-10324	16.4	29
94	Photodissociation of the SO ₂ ?SO ₂ dimer in the visible region of the spectrum: Product relative kinetic energy distributions and product angular distributions. <i>Journal of Chemical Physics</i> , 1985 , 82, 1832-1840	3.9	29
93	Importin β Can Bind Hepatitis B Virus Core Protein and Empty Core-Like Particles and Induce Structural Changes. <i>PLoS Pathogens</i> , 2016 , 12, e1005802	7.6	29
92	Proton transfer-induced conformational changes and melting in designed peptides in the gas phase. <i>Journal of the American Chemical Society</i> , 2006 , 128, 7193-7	16.4	28
91	Probing helix formation in unsolvated peptides. <i>Journal of the American Chemical Society</i> , 2003 , 125, 10740-7	16.4	28
90	Noncovalent Interactions between Unsolvated Peptides. <i>Journal of Physical Chemistry A</i> , 2002 , 106, 9655-9664	2.8	28
89	A viral scaffolding protein triggers portal ring oligomerization and incorporation during procapsid assembly. <i>Science Advances</i> , 2017 , 3, e1700423	14.3	27
88	Charge separation from the bursting of bubbles on water. <i>Journal of Physical Chemistry A</i> , 2011 , 115, 5723-8	2.8	27
87	Folding and unfolding of helix-turn-helix motifs in the gas phase. <i>Journal of the American Society for Mass Spectrometry</i> , 2007 , 18, 1239-48	3.5	27

86	The energy landscape of unsolvated peptides: helix formation and cold denaturation in Ac-A4G7A4 + H+. <i>Journal of the American Chemical Society</i> , 2002 , 124, 4422-31	16.4	27
85	Helix formation in unsolvated peptides: side chain entropy is not the determining factor. <i>Journal of the American Chemical Society</i> , 2001 , 123, 7907-8	16.4	27
84	Kinetic isotope effect in gas-phase base-induced elimination reactions. <i>Journal of the American Chemical Society</i> , 1985 , 107, 2818-2820	16.4	27
83	Disrupting Helix Formation in Unsolvated Peptides. <i>Journal of Physical Chemistry B</i> , 2001 , 105, 4436-4440	9.4	26
82	Structures of the Clusters Produced by Laser Desorption of Fullerenes: [2+2] Cycloadducts of Preshrunk Cages. <i>Journal of Physical Chemistry A</i> , 1998 , 102, 7919-7923	2.8	26
81	Heterogeneity of Glycan Processing on Trimeric SARS-CoV-2 Spike Protein Revealed by Charge Detection Mass Spectrometry. <i>Journal of the American Chemical Society</i> , 2021 , 143, 3959-3966	16.4	26
80	Helix-turn-helix motifs in unsolvated peptides. <i>Journal of the American Chemical Society</i> , 2003 , 125, 7186-7191	16.4	24
79	Raman and Fluorescence Spectra of Size-Selected, Matrix-Isolated C14 and C18 Neutral Carbon Clusters. <i>Journal of Physical Chemistry A</i> , 2001 , 105, 3029-3033	2.8	24
78	Structural studies of Sc metallofullerenes by high-resolution ion mobility measurements. <i>Journal of the American Chemical Society</i> , 2001 , 123, 6427-8	16.4	24
77	Mechanism of the metastable reaction H ₂ S ⁺ - IS ⁺ + H ₂ ; product energy distributions and their dependence on temperature. <i>Chemical Physics</i> , 1982 , 65, 19-28	2.3	24
76	Catching a virus in a molecular net. <i>Nanoscale</i> , 2016 , 8, 16221-8	7.7	23
75	Structurally similar woodchuck and human hepadnavirus core proteins have distinctly different temperature dependences of assembly. <i>Journal of Virology</i> , 2014 , 88, 14105-15	6.6	22
74	Stable copper-tin cluster compositions from high-temperature annealing. <i>Journal of Physical Chemistry A</i> , 2005 , 109, 8755-9	2.8	22
73	The mobile proton in polyalanine peptides. <i>Journal of the American Chemical Society</i> , 2004 , 126, 16981-7	16.4	22
72	Networked and Endohedral La ₂ C _n ⁺ (n = 28-100) Metallofullerenes. <i>Journal of the American Chemical Society</i> , 1995 , 117, 6404-6405	16.4	22
71	Chemisorption on the microsurface of metal clusters: activation barriers and chemical reactions for carbon monoxide, nitrogen, oxygen, and methane on aluminum cluster. <i>Journal of the American Chemical Society</i> , 1988 , 110, 6706-6716	16.4	22
70	Optimized Electrostatic Linear Ion Trap for Charge Detection Mass Spectrometry. <i>Journal of the American Society for Mass Spectrometry</i> , 2018 , 29, 2086-2095	3.5	21
69	The FUNPET-a New Hybrid Ion Funnel-Ion Carpet Atmospheric Pressure Interface for the Simultaneous Transmission of a Broad Mass Range. <i>Journal of the American Society for Mass Spectrometry</i> , 2018 , 29, 2160-2172	3.5	21

68	Improved signal stability from a laser vaporization source with a liquid metal target. <i>Review of Scientific Instruments</i> , 2007 , 78, 075108	1.7	21
67	A laser ion beam study of the photodissociation dynamics of the (CO) ₂ +3 cluster. <i>Journal of Chemical Physics</i> , 1986 , 84, 4882-4887	3.9	21
66	Real-Time Analysis and Signal Optimization for Charge Detection Mass Spectrometry. <i>Journal of the American Society for Mass Spectrometry</i> , 2019 , 30, 898-904	3.5	20
65	Phase coexistence in melting aluminum clusters. <i>Journal of Chemical Physics</i> , 2009 , 130, 204303	3.9	20
64	Substituting a copper atom modifies the melting of aluminum clusters. <i>Journal of Chemical Physics</i> , 2008 , 129, 124709	3.9	20
63	Pi-helix preference in unsolvated peptides. <i>Journal of the American Chemical Society</i> , 2004 , 126, 2777-84	16.4	20
62	Charge Detection Mass Spectrometry Measurements of Exosomes and other Extracellular Particles Enriched from Bovine Milk. <i>Analytical Chemistry</i> , 2020 , 92, 3285-3292	7.8	19
61	Virus-like particle size and molecular weight/mass determination applying gas-phase electrophoresis (native nES GEMMA). <i>Analytical and Bioanalytical Chemistry</i> , 2019 , 411, 5951-5962	4.4	19
60	Application of evolutionary algorithm methods to polypeptide folding: comparison with experimental results for unsolvated Ac-(Ala-Gly-Gly) ₅ -LysH ⁺ . <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2004 , 101, 7215-22	11.5	19
59	Molecular dynamics simulations of the rehydration of folded and unfolded cytochrome C ions in the vapor phase. <i>Journal of the American Chemical Society</i> , 2001 , 123, 6503-7	16.4	19
58	A molecular breadboard: Removal and replacement of subunits in a hepatitis B virus capsid. <i>Protein Science</i> , 2017 , 26, 2170-2180	6.3	18
57	Metal clusters that freeze into high energy geometries. <i>Journal of Chemical Physics</i> , 2008 , 129, 014503	3.9	17
56	Chemistry of semiconductor clusters. A survey of the reactions of Si ₂₅ ⁺ using low-energy ion beam techniques. <i>Journal of the American Chemical Society</i> , 1989 , 111, 1979-1986	16.4	17
55	Higher Resolution Charge Detection Mass Spectrometry. <i>Analytical Chemistry</i> , 2020 , 92, 11357-11364	7.8	17
54	Resolution of Lipoprotein Subclasses by Charge Detection Mass Spectrometry. <i>Analytical Chemistry</i> , 2018 , 90, 6353-6356	7.8	17
53	Peptide pinwheels. <i>Journal of the American Chemical Society</i> , 2002 , 124, 1154-5	16.4	16
52	Dissecting the Components of Sindbis Virus from Arthropod and Vertebrate Hosts: Implications for Infectivity Differences. <i>ACS Infectious Diseases</i> , 2019 , 5, 892-902	5.5	15
51	Metal clusters with hidden ground states: Melting and structural transitions in Al ₁₁₅ (+), Al ₁₁₆ (+), and Al ₁₁₇ (+). <i>Journal of Chemical Physics</i> , 2009 , 131, 124305	3.9	15

50	Noncovalent Interactions between Unsolvated Peptides: Dissociation of Helical and Globular Peptide Complexes. <i>Journal of Physical Chemistry B</i> , 2003 , 107, 14529-14536	3.4	15
49	Direct probing of zwitterion formation in unsolvated peptides. <i>Journal of the American Chemical Society</i> , 2003 , 125, 8996-7	16.4	15
48	The energy landscape of unsolvated peptides: the role of context in the stability of alanine/glycine helices. <i>Journal of the American Chemical Society</i> , 2003 , 125, 3941-7	16.4	15
47	Application of molecular beam deflection time-of-flight mass spectrometry to peptide analysis. <i>Analytical Chemistry</i> , 2003 , 75, 5512-6	7.8	15
46	Spontaneous Mass and Charge Losses from Single Multi-Megadalton Ions Studied by Charge Detection Mass Spectrometry. <i>Journal of the American Society for Mass Spectrometry</i> , 2017 , 28, 498-506	3.5	14
45	Freezing, fragmentation, and charge separation in sonic sprayed water droplets. <i>International Journal of Mass Spectrometry</i> , 2009 , 283, 191-199	1.9	14
44	Melting of alloy clusters: effects of aluminum doping on gallium cluster melting. <i>Journal of Physical Chemistry A</i> , 2007 , 111, 8056-61	2.8	14
43	Activation barriers for chemisorption of deuterium on aluminum cluster ions: Influence of oxygen preadsorption. <i>Chemical Physics Letters</i> , 1988 , 144, 311-316	2.5	14
42	A simple electrospray interface based on a DC ion carpet. <i>International Journal of Mass Spectrometry</i> , 2014 , 371, 1-7	1.9	13
41	Surface reactions driven by cluster impact: Oxidation of Si(111) by (O ₂) _{n+} (n~1600). <i>Journal of Chemical Physics</i> , 1997 , 106, 8855-8861	3.9	13
40	Left-handed and ambidextrous helices in the gas phase. <i>Journal of Physical Chemistry B</i> , 2005 , 109, 11777-80	3.4	13
39	Probing Antibody Binding to Canine Parvovirus with Charge Detection Mass Spectrometry. <i>Journal of the American Chemical Society</i> , 2018 , 140, 15701-15711	16.4	13
38	Dynamic Calibration Enables High-Accuracy Charge Measurements on Individual Ions for Charge Detection Mass Spectrometry. <i>Journal of the American Society for Mass Spectrometry</i> , 2020 , 31, 1241-1248	3.5	12
37	Non-covalent interactions between unsolvated peptides: helical complexes based on acid-base interactions. <i>Journal of Physical Chemistry B</i> , 2005 , 109, 6442-7	3.4	11
36	Implementation of a Charge-Sensitive Amplifier without a Feedback Resistor for Charge Detection Mass Spectrometry Reduces Noise and Enables Detection of Individual Ions Carrying a Single Charge. <i>Journal of the American Society for Mass Spectrometry</i> , 2020 , 31, 146-154	3.5	11
35	Dramatic Improvement in Sensitivity with Pulsed Mode Charge Detection Mass Spectrometry. <i>Analytical Chemistry</i> , 2019 , 91, 14002-14008	7.8	9
34	Surface chemistry on metal clusters: Observation of multiple structures for C ₂ H ₄ chemisorbed on aluminum clusters. <i>Chemical Physics Letters</i> , 1988 , 149, 433-438	2.5	8
33	N-terminal VP1 Truncations Favor = 1 Norovirus-Like Particles. <i>Vaccines</i> , 2020 , 9,	5.3	8

32	Melting of Size-Selected Aluminum Clusters with 150-42 Atoms: The Transition to Thermodynamic Scaling. <i>Journal of Physical Chemistry C</i> , 2017 , 121, 10242-10248	3.8	7
31	Disassembly Intermediates of the Brome Mosaic Virus Identified by Charge Detection Mass Spectrometry. <i>Journal of Physical Chemistry B</i> , 2020 , 124, 2124-2131	3.4	7
30	Virus Matryoshka: A Bacteriophage Particle-Guided Molecular Assembly Approach to a Monodisperse Model of the Immature Human Immunodeficiency Virus. <i>Small</i> , 2016 , 12, 5862-5872	11	7
29	Reactions of liquid and solid aluminum clusters with N ₂ : the role of structure and phase in Al ₁₁₄ (+), Al ₁₁₅ (+), and Al ₁₁₇ (+). <i>Journal of Chemical Physics</i> , 2014 , 141, 204304	3.9	7
28	Discovering free energy basins for macromolecular systems via guided multiscale simulation. <i>Journal of Physical Chemistry B</i> , 2012 , 116, 8534-44	3.4	7
27	Lot-to-Lot Variation in Adeno-Associated Virus Serotype 9 (AAV9) Preparations. <i>Human Gene Therapy Methods</i> , 2019 , 30, 214-225	4.9	7
26	Reactions of CO ₂ on solid and liquid Al ₁₀₀₊ . <i>Journal of Physical Chemistry A</i> , 2013 , 117, 1053-8	2.8	6
25	Techniques used to study the chemistry of gas phase elemental clusters. <i>Journal of Cluster Science</i> , 1991 , 2, 137-181	3	6
24	On the structure and photodissociation of cluster ions in the gas phase. (N ₂) (O ₂ ⁺) and (NO) ₂ ⁺ . <i>Chemical Physics Letters</i> , 1983 , 102, 335-339	2.5	6
23	A crossed beam study of the reaction of CO ⁺ with O ₂ . <i>Molecular Physics</i> , 1980 , 39, 787-798	1.7	6
22	Applications of Charge Detection Mass Spectrometry in Molecular Biology and Biotechnology. <i>Chemical Reviews</i> , 2021 ,	68.1	6
21	Virus Assembly Pathways: Straying Away but Not Too Far. <i>Small</i> , 2020 , 16, e2004475	11	6
20	Comparison of analytical techniques to quantitate the capsid content of adeno-associated viral vectors. <i>Molecular Therapy - Methods and Clinical Development</i> , 2021 , 23, 254-262	6.4	6
19	A frequency and amplitude scanned quadrupole mass filter for the analysis of high m/z ions. <i>Review of Scientific Instruments</i> , 2014 , 85, 113109	1.7	5
18	A first-order transition in the charge-induced conformational changes of polymers. <i>Journal of Chemical Physics</i> , 2002 , 116, 9964-9974	3.9	5
17	Studies of the chemistry of large semiconductor cluster ions. <i>International Journal of Mass Spectrometry and Ion Processes</i> , 1990 , 100, 625-646		5
16	Fragmentation dynamics and energy disposal in photodissociation of (N ₂ O) ₂ ⁺ in the 458-60 nm wavelength range. <i>Chemical Physics</i> , 1985 , 95, 469-472	2.3	5
15	The fragmentation of metastable NH ₃ ⁺ ions and isotopic analogs: an example of tunneling through a rotational barrier. <i>Chemical Physics Letters</i> , 1982 , 92, 653-658	2.5	5

14	Ion-Ion Interactions in Charge Detection Mass Spectrometry. <i>Journal of the American Society for Mass Spectrometry</i> , 2019 , 30, 2741-2749	3.5	4
13	Asymmetrizing an icosahedral virus capsid by hierarchical assembly of subunits with designed asymmetry. <i>Nature Communications</i> , 2021 , 12, 589	17.4	4
12	Quantitative analysis of genome packaging in recombinant AAV vectors by charge detection mass spectrometry. <i>Molecular Therapy - Methods and Clinical Development</i> , 2021 , 23, 87-97	6.4	4
11	Determination of Antibody Population Distributions for Virus-Antibody Conjugates by Charge Detection Mass Spectrometry. <i>Analytical Chemistry</i> , 2020 , 92, 1285-1291	7.8	3
10	Thermal Analysis of a Mixture of Ribosomal Proteins by vT-ESI-MS: Toward a Parallel Approach for Characterizing the. <i>Analytical Chemistry</i> , 2021 , 93, 8484-8492	7.8	3
9	Characterization of Classical Vaccines by Charge Detection Mass Spectrometry. <i>Analytical Chemistry</i> , 2021 , 93, 11965-11972	7.8	3
8	Dehydrogenation of benzene on liquid Al ₁₀₀ (+). <i>Journal of Physical Chemistry A</i> , 2013 , 117, 2075-81	2.8	2
7	Characterization of Recombinant Chimpanzee Adenovirus C68 Low and High-Density Particles: Impact on Determination of Viral Particle Titer. <i>Frontiers in Bioengineering and Biotechnology</i> , 2021 , 9, 753480	5.8	2
6	A crossed beam study of the reaction CO ⁺ + NO -> CO ₂ + N. <i>Molecular Physics</i> , 1980 , 40, 1197-1207	1.7	1
5	Core Protein-Directed Antivirals and Importin β Can Synergistically Disrupt HBV Capsids. <i>Journal of Virology</i> , 2021 , JVI0139521	6.6	1
4	HBV Core-Directed Antivirals and Importin β Can Synergistically Disrupt Capsids. <i>Microscopy and Microanalysis</i> , 2021 , 27, 1130-1131	0.5	1
3	Core Protein-Directed Antivirals and Importin β Can Synergistically Disrupt HBV Capsids		1
2	A crossed beam study of the reaction CO ⁺⁺ NO-(NCO) ⁺⁺ O. <i>Molecular Physics</i> , 1981 , 42, 97-107	1.7	
1	Calcium Contributes to Polarized Targeting of HIV Assembly Machinery by Regulating Complex Stability.. <i>Jacs Au</i> , 2022 , 2, 522-530		