

# Kevin Pagel

## List of Publications by Citations

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121  
papers

3,663  
citations

37  
h-index

57  
g-index

139  
ext. papers

4,387  
ext. citations

8  
avg, IF

5.71  
L-index

#	Paper	IF	Citations
121	Identification of carbohydrate anomers using ion mobility-mass spectrometry. <i>Nature</i> , <b>2015</b> , 526, 241-4	50.4	223
120	Recommendations for reporting ion mobility Mass Spectrometry measurements. <i>Mass Spectrometry Reviews</i> , <b>2019</b> , 38, 291-320	11	191
119	Protomers of benzocaine: solvent and permittivity dependence. <i>Journal of the American Chemical Society</i> , <b>2015</b> , 137, 4236-42	16.4	132
118	An infrared spectroscopy approach to follow $\beta$ -sheet formation in peptide amyloid assemblies. <i>Nature Chemistry</i> , <b>2017</b> , 9, 39-44	17.6	127
117	Alternate dissociation pathways identified in charge-reduced protein complex ions. <i>Analytical Chemistry</i> , <b>2010</b> , 82, 5363-72	7.8	126
116	Ion mobility-mass spectrometry of complex carbohydrates: collision cross sections of sodiated N-linked glycans. <i>Analytical Chemistry</i> , <b>2013</b> , 85, 5138-45	7.8	112
115	Random coils, beta-sheet ribbons, and alpha-helical fibers: one peptide adopting three different secondary structures at will. <i>Journal of the American Chemical Society</i> , <b>2006</b> , 128, 2196-7	16.4	101
114	Glycan Analysis by Ion Mobility-Mass Spectrometry. <i>Angewandte Chemie - International Edition</i> , <b>2017</b> , 56, 8342-8349	16.4	94
113	Glycan Fingerprinting via Cold-Ion Infrared Spectroscopy. <i>Angewandte Chemie - International Edition</i> , <b>2017</b> , 56, 11248-11251	16.4	88
112	Retention of Native Protein Structures in the Absence of Solvent: A Coupled Ion Mobility and Spectroscopic Study. <i>Angewandte Chemie - International Edition</i> , <b>2016</b> , 55, 14173-14176	16.4	85
111	Photodissociation of conformer-selected ubiquitin ions reveals site-specific cis/trans isomerization of proline peptide bonds. <i>Journal of the American Chemical Society</i> , <b>2014</b> , 136, 10308-14	16.4	80
110	Intrinsically disordered p53 and its complexes populate compact conformations in the gas phase. <i>Angewandte Chemie - International Edition</i> , <b>2013</b> , 52, 361-5	16.4	77
109	Automated glycan assembly using the Glyconeer 2.1 synthesizer. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , <b>2017</b> , 114, E3385-E3389	11.5	75
108	Distinguishing N-acetylneuraminic acid linkage isomers on glycopeptides by ion mobility-mass spectrometry. <i>Chemical Communications</i> , <b>2016</b> , 52, 4381-4	5.8	74
107	Estimating collision cross sections of negatively charged N-glycans using traveling wave ion mobility-mass spectrometry. <i>Analytical Chemistry</i> , <b>2014</b> , 86, 10789-95	7.8	74
106	Secondary Structure of Ac-Alan-LysH <sup>+</sup> Polyalanine Peptides (n = 5,10,15) in Vacuo: Helical or Not?. <i>Journal of Physical Chemistry Letters</i> , <b>2010</b> , 1, 3465-3470	6.4	72
105	Protein structure in the gas phase: the influence of side-chain microsolvation. <i>Journal of the American Chemical Society</i> , <b>2013</b> , 135, 1177-80	16.4	66

104	GlycoMob: an ion mobility-mass spectrometry collision cross section database for glycomics. <i>Glycoconjugate Journal</i> , <b>2016</b> , 33, 399-404	3	59
103	Amide-I and -II vibrations of the cyclic beta-sheet model peptide gramicidin S in the gas phase. <i>Journal of the American Chemical Society</i> , <b>2010</b> , 132, 2085-93	16.4	56
102	Advancing Solutions to the Carbohydrate Sequencing Challenge. <i>Journal of the American Chemical Society</i> , <b>2019</b> , 141, 14463-14479	16.4	55
101	Interaction of the p53 DNA-binding domain with its n-terminal extension modulates the stability of the p53 tetramer. <i>Journal of Molecular Biology</i> , <b>2011</b> , 409, 358-68	6.5	54
100	Charge-Induced Unzipping of Isolated Proteins to a Defined Secondary Structure. <i>Angewandte Chemie - International Edition</i> , <b>2016</b> , 55, 3295-9	16.4	52
99	Glycan analysis by ion mobility-mass spectrometry and gas-phase spectroscopy. <i>Current Opinion in Chemical Biology</i> , <b>2018</b> , 42, 16-24	9.7	50
98	How metal ions affect amyloid formation: Cu <sup>2+</sup> - and Zn <sup>2+</sup> -sensitive peptides. <i>ChemBioChem</i> , <b>2008</b> , 9, 531-6	3.8	49
97	The impact of environment and resonance effects on the site of protonation of aminobenzoic acid derivatives. <i>Physical Chemistry Chemical Physics</i> , <b>2016</b> , 18, 25474-25482	3.6	47
96	Following polypeptide folding and assembly with conformational switches. <i>Current Opinion in Chemical Biology</i> , <b>2008</b> , 12, 730-9	9.7	46
95	Ion mobility separation of deprotonated oligosaccharide isomers - evidence for gas-phase charge migration. <i>Chemical Communications</i> , <b>2016</b> , 52, 12353-12356	5.8	46
94	Identification of Lewis and Blood Group Carbohydrate Epitopes by Ion Mobility-Tandem-Mass Spectrometry Fingerprinting. <i>Analytical Chemistry</i> , <b>2017</b> , 89, 2318-2325	7.8	44
93	Infrared spectrum and structure of the homochiral serine octamer-dichloride complex. <i>Nature Chemistry</i> , <b>2017</b> , 9, 1263-1268	17.6	44
92	Remote Participation during Glycosylation Reactions of Galactose Building Blocks: Direct Evidence from Cryogenic Vibrational Spectroscopy. <i>Angewandte Chemie - International Edition</i> , <b>2020</b> , 59, 6166-6171	16.4	43
91	Exploring the conformational preferences of 20-residue peptides in isolation: Ac-Ala <sup>19</sup> -Lys + H <sup>(+)</sup> vs. Ac-Lys-Ala <sup>19</sup> + H <sup>(+)</sup> and the current reach of DFT. <i>Physical Chemistry Chemical Physics</i> , <b>2015</b> , 17, 7373-85	3.6	42
90	Energy-resolved ion mobility-mass spectrometry--a concept to improve the separation of isomeric carbohydrates. <i>Journal of the American Society for Mass Spectrometry</i> , <b>2014</b> , 25, 471-9	3.5	41
89	In-depth structural analysis of glycans in the gas phase. <i>Chemical Science</i> , <b>2019</b> , 10, 1272-1284	9.4	39
88	Analyzing the higher order structure of proteins with conformer-selective ultraviolet photodissociation. <i>Proteomics</i> , <b>2015</b> , 15, 2804-12	4.8	38
87	From alpha-helix to beta-sheet--a reversible metal ion induced peptide secondary structure switch. <i>Organic and Biomolecular Chemistry</i> , <b>2005</b> , 3, 2500-2	3.9	38

86	Directing the secondary structure of polypeptides at will: from helices to amyloids and back again?. <i>Organic and Biomolecular Chemistry</i> , <b>2005</b> , 3, 3843-50	3.9	38
85	Unravelling the structure of glycosyl cations via cold-ion infrared spectroscopy. <i>Nature Communications</i> , <b>2018</b> , 9, 4174	17.4	38
84	Fucose Migration in Intact Protonated Glycan Ions: A Universal Phenomenon in Mass Spectrometry. <i>Angewandte Chemie - International Edition</i> , <b>2018</b> , 57, 7440-7443	16.4	36
83	Modular detergents tailor the purification and structural analysis of membrane proteins including G-protein coupled receptors. <i>Nature Communications</i> , <b>2020</b> , 11, 564	17.4	36
82	Collision cross sections of high-mannose N-glycans in commonly observed adduct states--identification of gas-phase conformers unique to [M-H] <sup>-</sup> ions. <i>Analyst, The</i> , <b>2015</b> , 140, 6799-803 <sup>5</sup>		35
81	NFGAIL Amyloid Oligomers: The Onset of Beta-Sheet Formation and the Mechanism for Fibril Formation. <i>Journal of the American Chemical Society</i> , <b>2018</b> , 140, 244-249	16.4	34
80	How cations change peptide structure. <i>Chemistry - A European Journal</i> , <b>2013</b> , 19, 11224-34	4.8	32
79	Travelling-wave ion mobility and negative ion fragmentation of high-mannose N-glycans. <i>Journal of Mass Spectrometry</i> , <b>2016</b> , 51, 219-35	2.2	32
78	Surprising solvent-induced structural rearrangements in large [N <sub>100000</sub> N] halogen-bonded supramolecular capsules: an ion mobility-mass spectrometry study. <i>Chemical Science</i> , <b>2018</b> , 9, 8343-8351 <sup>9.4</sup>		31
77	Intramolecular charge interactions as a tool to control the coiled-coil-to-amyloid transformation. <i>Chemistry - A European Journal</i> , <b>2008</b> , 14, 11442-51	4.8	29
76	Ion mobility-mass spectrometry as a tool to investigate protein-ligand interactions. <i>Analytical and Bioanalytical Chemistry</i> , <b>2017</b> , 409, 4305-4310	4.4	28
75	Global N-Glycan Site Occupancy of HIV-1 gp120 by Metabolic Engineering and High-Resolution Intact Mass Spectrometry. <i>ACS Chemical Biology</i> , <b>2017</b> , 12, 357-361	4.9	27
74	Ion mobility-mass spectrometry and orthogonal gas-phase techniques to study amyloid formation and inhibition. <i>Current Opinion in Structural Biology</i> , <b>2017</b> , 46, 7-15	8.1	26
73	Travelling-wave ion mobility mass spectrometry and negative ion fragmentation of hybrid and complex N-glycans. <i>Journal of Mass Spectrometry</i> , <b>2016</b> , 51, 1064-1079	2.2	26
72	Shotgun ion mobility mass spectrometry sequencing of heparan sulfate saccharides. <i>Nature Communications</i> , <b>2020</b> , 11, 1481	17.4	24
71	Glycan Isomer Identification Using Ultraviolet Photodissociation Initiated Radical Chemistry. <i>Analytical Chemistry</i> , <b>2018</b> , 90, 11581-11588	7.8	24
70	Online monitoring the isomerization of an azobenzene-based dendritic bolaamphiphile using ion mobility-mass spectrometry. <i>Chemical Communications</i> , <b>2015</b> , 51, 8801-4	5.8	22
69	Advanced approaches for the characterization of a de novo designed antiparallel coiled coil peptide. <i>Organic and Biomolecular Chemistry</i> , <b>2005</b> , 3, 1189-94	3.9	22

68	Collision Cross Sections and Ion Mobility Separation of Fragment Ions from Complex N-Glycans. <i>Journal of the American Society for Mass Spectrometry</i> , <b>2018</b> , 29, 1250-1261	3.5	20
67	An Intrinsic Hydrophobicity Scale for Amino Acids and Its Application to Fluorinated Compounds. <i>Angewandte Chemie - International Edition</i> , <b>2019</b> , 58, 8216-8220	16.4	18
66	Emergence of low-symmetry foldamers from single monomers. <i>Nature Chemistry</i> , <b>2020</b> , 12, 1180-1186	17.6	18
65	Structure analysis of an amyloid-forming model peptide by a systematic glycine and proline scan. <i>Biomacromolecules</i> , <b>2011</b> , 12, 2988-96	6.9	17
64	Gas-phase IR spectra of intact $\alpha$ -helical coiled coil protein complexes. <i>International Journal of Mass Spectrometry</i> , <b>2009</b> , 283, 161-168	1.9	17
63	Gas-phase microsolvation of ubiquitin: investigation of crown ether complexation sites using ion mobility-mass spectrometry. <i>Analyst, The</i> , <b>2016</b> , 141, 5502-10	5	16
62	IR action spectroscopy of glycosaminoglycan oligosaccharides. <i>Analytical and Bioanalytical Chemistry</i> , <b>2020</b> , 412, 533-537	4.4	16
61	Unravelling the structural complexity of glycolipids with cryogenic infrared spectroscopy. <i>Nature Communications</i> , <b>2021</b> , 12, 1201	17.4	16
60	Switchable synchronisation of pirouetting motions in a redox-active [3]rotaxane. <i>Nanoscale</i> , <b>2018</b> , 10, 21425-21433	7.7	15
59	Polysulfates Block SARS-CoV-2 Uptake through Electrostatic Interactions*. <i>Angewandte Chemie - International Edition</i> , <b>2021</b> , 60, 15870-15878	16.4	14
58	Ladungsinduziertes Entwinden isolierter Proteine zu einer definierten Sekundärstruktur. <i>Angewandte Chemie</i> , <b>2016</b> , 128, 3356-3360	3.6	14
57	The role of the mobile proton in fucose migration. <i>Analytical and Bioanalytical Chemistry</i> , <b>2019</b> , 411, 4637-4645	14	14
56	Resolving Sphingolipid Isomers Using Cryogenic Infrared Spectroscopy. <i>Angewandte Chemie - International Edition</i> , <b>2020</b> , 59, 13638-13642	16.4	14
55	From Compact to String-The Role of Secondary and Tertiary Structure in Charge-Induced Unzipping of Gas-Phase Proteins. <i>Journal of the American Society for Mass Spectrometry</i> , <b>2017</b> , 28, 638-646	3.5	13
54	Native like helices in a specially designed $\alpha$ -peptide in the gas phase. <i>Physical Chemistry Chemical Physics</i> , <b>2015</b> , 17, 5376-85	3.6	13
53	Cryogenic Infrared Spectroscopy Reveals Structural Modularity in the Vibrational Fingerprints of Heparan Sulfate Diastereomers. <i>Analytical Chemistry</i> , <b>2020</b> , 92, 10228-10232	7.8	13
52	Fernpartizipation in Glykosylierungen von Galaktose-Bausteinen: Direktnachweis durch kryogene Schwingungsspektroskopie. <i>Angewandte Chemie</i> , <b>2020</b> , 132, 6224-6229	3.6	12
51	Separation of isomeric glycans by ion mobility spectrometry - the impact of fluorescent labelling. <i>Analyst, The</i> , <b>2019</b> , 144, 5292-5298	5	12

50	Fingerabdrücke für Glykane durch Spektroskopie kalter Ionen. <i>Angewandte Chemie</i> , <b>2017</b> , 129, 11400-11404	4.6	12
49	The Impact of Leaving Group Anomerism on the Structure of Glycosyl Cations of Protected Galactosides. <i>ChemPhysChem</i> , <b>2020</b> , 21, 1905-1907	3.2	12
48	Assessing the stability of alanine-based helices by conformer-selective IR spectroscopy. <i>Physical Chemistry Chemical Physics</i> , <b>2016</b> , 18, 19950-4	3.6	12
47	Noncharged and Charged Monodendronised Perylene Bisimides as Highly Fluorescent Labels and their Bioconjugates. <i>Chemistry - A European Journal</i> , <b>2017</b> , 23, 4849-4862	4.8	11
46	Side-chain effects on the structures of protonated amino acid dimers: A gas-phase infrared spectroscopy study. <i>International Journal of Mass Spectrometry</i> , <b>2018</b> , 429, 115-120	1.9	11
45	Exploring the Potential of Dendritic Oligoglycerol Detergents for Protein Mass Spectrometry. <i>Journal of the American Society for Mass Spectrometry</i> , <b>2019</b> , 30, 174-180	3.5	11
44	Critical Evaluation of Native Electrospray Ionization Mass Spectrometry for Fragment-Based Screening. <i>ChemMedChem</i> , <b>2017</b> , 12, 1201-1211	3.7	10
43	A new azobenzene-based design strategy for detergents in membrane protein research. <i>Chemical Science</i> , <b>2020</b> , 11, 3538-3546	9.4	10
42	Direct Experimental Characterization of the Ferrier Glycosyl Cation in the Gas Phase. <i>Organic Letters</i> , <b>2020</b> , 22, 8916-8919	6.2	9
41	Oligomerisation of Synaptobrevin-2 Studied by Native Mass Spectrometry and Chemical Cross-Linking. <i>Journal of the American Society for Mass Spectrometry</i> , <b>2019</b> , 30, 149-160	3.5	9
40	Mass Spectrometry-Based Techniques to Elucidate the Sugar Code. <i>Chemical Reviews</i> , <b>2021</b> ,	68.1	8
39	Presynaptic Calmodulin targets: lessons from structural proteomics. <i>Expert Review of Proteomics</i> , <b>2017</b> , 14, 223-242	4.2	7
38	Dendritic Oligoglycerol Regioisomer Mixtures and Their Utility for Membrane Protein Research. <i>Chemistry - A European Journal</i> , <b>2021</b> , 27, 2537-2542	4.8	7
37	Gas-Phase Structural Analysis of Supramolecular Assemblies. <i>Accounts of Chemical Research</i> , <b>2021</b> , 54, 2445-2456	24.3	6
36	Switchable Solubility of Azobenzene-Based Bolaamphiphiles. <i>ChemPhysChem</i> , <b>2019</b> , 20, 1690-1697	3.2	5
35	Plate-height model of ion mobility-mass spectrometry. <i>Analyst, The</i> , <b>2020</b> , 145, 6313-6333	5	5
34	Chondroitin Sulfate Disaccharides in the Gas Phase: Differentiation and Conformational Constraints. <i>Journal of Physical Chemistry A</i> , <b>2021</b> , 125, 4373-4379	2.8	5
33	Sclerotiorin Stabilizes the Assembly of Nonfibrillar Abeta42 Oligomers with Low Toxicity, Seeding Activity, and Beta-sheet Content. <i>Journal of Molecular Biology</i> , <b>2020</b> , 432, 2080-2098	6.5	4

32	Charge-induced geometrical reorganization of DNA oligonucleotides studied by tandem mass spectrometry and ion mobility. <i>European Journal of Mass Spectrometry</i> , <b>2018</b> , 24, 225-230	1.1	4
31	Intrinsically Disordered p53 and Its Complexes Populate Compact Conformations in the Gas Phase. <i>Angewandte Chemie</i> , <b>2013</b> , 125, 379-383	3.6	4
30	Unveiling Glycerolipid Fragmentation by Cryogenic Infrared Spectroscopy. <i>Journal of the American Chemical Society</i> , <b>2021</b> , 143, 14827-14834	16.4	4
29	Glykananalyse mittels Ionenmobilitäts-Massenspektrometrie. <i>Angewandte Chemie</i> , <b>2017</b> , 129, 8458-8466	3.6	3
28	Comparison of the fragmentation behavior of DNA and LNA single strands and duplexes. <i>Journal of Mass Spectrometry</i> , <b>2019</b> , 54, 402-411	2.2	3
27	Conformational Shift of a Hairpin Peptide upon Complex Formation with an Oligo-proline Peptide Studied by Mass Spectrometry. <i>ChemistrySelect</i> , <b>2016</b> , 1, 3651-3656	1.8	3
26	Die Erhaltung nativer Proteinstrukturen unter Ausschluss von Lösungsmittel: eine Untersuchung mit Hilfe der Kombination von Ionenmobilität mit Spektroskopie. <i>Angewandte Chemie</i> , <b>2016</b> , 128, 14380-14384	3.6	3
25	Fucose-Migration in intakten protonierten Glykan-Ionen: ein universelles Phänomen in der Massenspektrometrie. <i>Angewandte Chemie</i> , <b>2018</b> , 130, 7562-7565	3.6	3
24	Gas-phase infrared spectroscopy of glycans and glycoconjugates.. <i>Current Opinion in Structural Biology</i> , <b>2021</b> , 72, 194-202	8.1	3
23	Analytical challenges of glycosaminoglycans at biological interfaces. <i>Analytical and Bioanalytical Chemistry</i> , <b>2021</b> , 1	4.4	3
22	Exon Inclusion Modulates Conformational Plasticity and Autoinhibition of the Intersectin 1 SH3A Domain. <i>Structure</i> , <b>2019</b> , 27, 977-987.e5	5.2	2
21	To Anion-Binder not to Anion-Binding: The Case of Anion-Binding to Divalent Fluorinated Pyridines in the Gas Phase. <i>Chemistry - A European Journal</i> , <b>2018</b> , 24, 12879-12889	4.8	2
20	Dissecting structure-function of 3-O-sulfated heparin and engineered heparan sulfates.. <i>Science Advances</i> , <b>2021</b> , 7, eabl6026	14.3	2
19	Non-covalent double bond sensors for gas-phase infrared spectroscopy of unsaturated fatty acids. <i>Analytical and Bioanalytical Chemistry</i> , <b>2021</b> , 413, 3643-3653	4.4	2
18	Plate-height model of ion mobility-mass spectrometry: Part 2-Peak-to-peak resolution and peak capacity. <i>Journal of Separation Science</i> , <b>2021</b> , 44, 2798-2813	3.4	2
17	The protofilament architecture of a de novo designed coiled coil-based amyloidogenic peptide. <i>Journal of Structural Biology</i> , <b>2018</b> , 203, 263-272	3.4	2
16	The interaction of chondroitin sulfate with a lipid monolayer observed by using nonlinear vibrational spectroscopy. <i>Physical Chemistry Chemical Physics</i> , <b>2021</b> , 23, 13389-13395	3.6	2
15	Protein Secondary Structure Affects Glycan Clustering in Native Mass Spectrometry. <i>Life</i> , <b>2021</b> , 11,	3	1



14	Photooxygenation and gas-phase reactivity of multiply threaded pseudorotaxanes. <i>Journal of Mass Spectrometry</i> , <b>2016</b> , 51, 269-81	2.2	1
13	Modular Ion Mobility Calibrants for Organometallic Anions Based on Tetraorganylborate Salts. <i>Analytical Chemistry</i> , <b>2021</b> , 93, 9797-9807	7.8	1
12	Non-ionic hybrid detergents for protein delipidation.. <i>Biochimica Et Biophysica Acta - Biomembranes</i> , <b>2022</b> , 183958	3.8	1
11	Eine intrinsische Hydrophobieskala für Aminosäuren und ihre Anwendung auf fluorierte Verbindungen. <i>Angewandte Chemie</i> , <b>2019</b> , 131, 8300-8304	3.6	0
10	Unterscheidung von isomeren Sphingolipiden mittels kryogener Infrarotspektroskopie. <i>Angewandte Chemie</i> , <b>2020</b> , 132, 13740-13744	3.6	0
9	Cryogenic infrared spectroscopy provides mechanistic insight into the fragmentation of phospholipid silver adducts.. <i>Analytical and Bioanalytical Chemistry</i> , <b>2022</b> , 1	4.4	0
8	Structural characterization of fondaparinux interaction with per-6-amino-beta-cyclodextrin: An NMR and MS study. <i>Journal of Pharmaceutical and Biomedical Analysis</i> , <b>2021</b> , 197, 113947	3.5	0
7	Trendbericht: Analytische Chemie 2016/2017. <i>Nachrichten Aus Der Chemie</i> , <b>2018</b> , 66, 389-399	0.1	
6	Rücktitelbild: Die Erhaltung nativer Proteinstrukturen unter Ausschluss von Lösungsmittel: eine Untersuchung mit Hilfe der Kombination von Ionenmobilität mit Spektroskopie (Angew. Chem. 45/2016). <i>Angewandte Chemie</i> , <b>2016</b> , 128, 14386-14386	3.6	
5	Von normalen Proteinen zu unelastischen Ablagerungen. <i>Nachrichten Aus Der Chemie</i> , <b>2017</b> , 65, 874-878	0.1	
4	Innentitelbild: Unterscheidung von isomeren Sphingolipiden mittels kryogener Infrarotspektroskopie (Angew. Chem. 32/2020). <i>Angewandte Chemie</i> , <b>2020</b> , 132, 13226-13226	3.6	
3	Polysulfate hemmen durch elektrostatische Wechselwirkungen die SARS-CoV-2-Infektion**. <i>Angewandte Chemie</i> , <b>2021</b> , 133, 16005-16014	3.6	
2	Kohlenhydratanalytik <b>2022</b> , 659-688		
1	Spectroscopy of Small and Large Biomolecular Ions in Helium-Nanodroplets. <i>Topics in Applied Physics</i> , <b>2022</b> , 241-280	0.5	