

Huub Jm De Groot

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226 papers	7,726 citations	45 h-index	76 g-index
231 ext. papers	8,202 ext. citations	5.6 avg, IF	5.68 L-index

#	Paper	IF	Citations
226	Backbone and side-chain ¹³ C and ¹⁵ N signal assignments of the alpha-spectrin SH3 domain by magic angle spinning solid-state NMR at 17.6 Tesla. <i>ChemBioChem</i> , 2001 , 2, 272-81	3.8	279
225	Alternating syn-anti bacteriochlorophylls form concentric helical nanotubes in chlorosomes. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2009 , 106, 8525-30	11.5	253
224	Artificial photosynthesis as a frontier technology for energy sustainability. <i>Energy and Environmental Science</i> , 2013 , 6, 1074	35.4	251
223	¹³ C NMR Study of the Grafting of Maleic Anhydride onto Polyethylene, Polypropylene, and EthenePropene Copolymers. <i>Macromolecules</i> , 1996 , 29, 1151-1157	5.5	186
222	Nuclear magnetic resonance study of the Schiff base in bacteriorhodopsin: counterion effects on the ¹⁵ N shift anisotropy. <i>Biochemistry</i> , 1989 , 28, 3346-53	3.2	174
221	¹³ C magic-angle spinning NMR studies of bathorhodopsin, the primary photoproduct of rhodopsin. <i>Biochemistry</i> , 1991 , 30, 7409-15	3.2	173
220	Sample optimization and identification of signal patterns of amino acid side chains in 2D RFDR spectra of the alpha-spectrin SH3 domain. <i>Journal of Magnetic Resonance</i> , 2000 , 143, 411-6	3	152
219	A refined model of the chlorosomal antennae of the green bacterium <i>Chlorobium tepidum</i> from proton chemical shift constraints obtained with high-field 2-D and 3-D MAS NMR dipolar correlation spectroscopy. <i>Biochemistry</i> , 2001 , 40, 1587-95	3.2	139
218	CP-MAS ¹³ C-NMR dipolar correlation spectroscopy of ¹³ C-enriched chlorosomes and isolated bacteriochlorophyll c aggregates of <i>Chlorobium tepidum</i> : the self-organization of pigments is the main structural feature of chlorosomes. <i>Biochemistry</i> , 1995 , 34, 15259-66	3.2	136
217	Secondary chemical shifts in immobilized peptides and proteins: a qualitative basis for structure refinement under magic angle spinning. <i>Journal of Biomolecular NMR</i> , 2001 , 20, 325-31	3	132
216	Solid-state ¹³ C and ¹⁵ N NMR study of the low pH forms of bacteriorhodopsin. <i>Biochemistry</i> , 1990 , 29, 6873-83	3.2	127
215	Surface-immobilized single-site iridium complexes for electrocatalytic water splitting. <i>Angewandte Chemie - International Edition</i> , 2012 , 51, 9601-5	16.4	113
214	(1)H and (13)C MAS NMR evidence for pronounced ligand-protein interactions involving the ionone ring of the retinylidene chromophore in rhodopsin. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2002 , 99, 9101-6	11.5	109
213	Asymmetric binding of the 1- and 4-C=O groups of QA in <i>Rhodobacter sphaeroides</i> R26 reaction centres monitored by Fourier transform infra-red spectroscopy using site-specific isotopically labelled ubiquinone-10.. <i>EMBO Journal</i> , 1994 , 13, 5523-5530	13	100
212	Retinylidene ligand structure in bovine rhodopsin, metarhodopsin-I, and 10-methylrhodopsin from internuclear distance measurements using ¹³ C-labeling and 1-D rotational resonance MAS NMR. <i>Biochemistry</i> , 1999 , 38, 11316-24	3.2	94
211	Heteronuclear 2D-correlations in a uniformly [¹³ C, ¹⁵ N] labeled membrane-protein complex at ultra-high magnetic fields. <i>Journal of Biomolecular NMR</i> , 2001 , 19, 243-53	3	83
210	Controlled Surface-Assembly of Nanoscale Leaf-Type Cu-Oxide Electrocatalyst for High Activity Water Oxidation. <i>ACS Catalysis</i> , 2016 , 6, 1768-1771	13.1	76

209	De novo design of conformationally flexible transmembrane peptides driving membrane fusion. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2004 , 101, 14776-81	11.5	74
208	Solid-state NMR studies of the mechanism of the opsin shift in the visual pigment rhodopsin. <i>Biochemistry</i> , 1990 , 29, 8158-64	3.2	74
207	Solid-state NMR spectroscopy applied to membrane proteins. <i>Current Opinion in Structural Biology</i> , 2000 , 10, 593-600	8.1	73
206	Longitudinal assessment of Alzheimer's beta-amyloid plaque development in transgenic mice monitored by in vivo magnetic resonance microimaging. <i>Journal of Magnetic Resonance Imaging</i> , 2006 , 24, 530-6	5.6	71
205	¹³ C magic angle spinning NMR study of the light-induced and temperature-dependent changes in Rhodobacter sphaeroides R26 reaction centers enriched in [4'- ¹³ C]tyrosine. <i>Biochemistry</i> , 1992 , 31, 11038-49	3.2	71
204	Structure and protein environment of the retinal chromophore in light- and dark-adapted bacteriorhodopsin studied by solid-state NMR. <i>Biochemistry</i> , 1989 , 28, 8897-904	3.2	68
203	Photochemically induced nuclear spin polarization in reaction centers of photosystem II observed by ¹³ C-solid-state NMR reveals a strongly asymmetric electronic structure of the P680(+) primary donor chlorophyll. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2000 , 97, 9865-70	11.5	67
202	Solid state ¹⁵ N NMR evidence for a complex Schiff base counterion in the visual G-protein-coupled receptor rhodopsin. <i>Biochemistry</i> , 1999 , 38, 7195-9	3.2	66
201	Solar Water Splitting Combining a BiVO ₄ Light Absorber with a Ru-Based Molecular Cocatalyst. <i>Journal of Physical Chemistry C</i> , 2015 , 119, 7275-7281	3.8	65
200	Ni-Based Electrocatalyst for Water Oxidation Developed In-Situ in a HCO ₃ ⁻ /CO ₂ System at Near-Neutral pH. <i>Advanced Energy Materials</i> , 2014 , 4, 1301929	21.8	65
199	Magnetic field dependence of photo-CIDNP MAS NMR on photosynthetic reaction centers of Rhodobacter sphaeroides WT. <i>Journal of the American Chemical Society</i> , 2005 , 127, 14290-8	16.4	65
198	Determination of a molecular torsional angle in the metarhodopsin-I photointermediate of rhodopsin by double-quantum solid-state NMR. <i>Journal of Biomolecular NMR</i> , 2000 , 16, 1-8	3	63
197	Zinc chlorins for artificial light-harvesting self-assemble into antiparallel stacks forming a microcrystalline solid-state material. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2009 , 106, 11472-7	11.5	61
196	FTIR spectroscopy shows weak symmetric hydrogen bonding of the QB carbonyl groups in Rhodobacter sphaeroides R26 reaction centres. <i>FEBS Letters</i> , 1995 , 370, 88-92	3.8	58
195	Power generation by reverse electrodialysis in a single-layer nanoporous membrane made from core-rim polycyclic aromatic hydrocarbons. <i>Nature Nanotechnology</i> , 2020 , 15, 307-312	28.7	57
194	Magic angle spinning NMR studies on the metarhodopsin II intermediate of bovine rhodopsin: evidence for an unprotonated Schiff base. <i>Photochemistry and Photobiology</i> , 1992 , 56, 1035-9	3.6	57
193	Artificial Photosynthesis for Solar Fuels In an Evolving Research Field within AMPEA, a Joint Programme of the European Energy Research Alliance. <i>Green</i> , 2013 , 3,		56
192	¹⁵ N photochemically induced dynamic nuclear polarization magic-angle spinning NMR analysis of the electron donor of photosystem II. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2007 , 104, 12767-71	11.5	56

191	(13)C MAS NMR and photo-CIDNP reveal a pronounced asymmetry in the electronic ground state of the special pair of Rhodobacter sphaeroides reaction centers. <i>Biochemistry</i> , 2002 , 41, 8708-17	3.2	54
190	Energy Storage in the Primary Photoproduct of Vision. <i>Journal of Physical Chemistry B</i> , 1997 , 101, 2954-2958	3.4	53
189	Surface Generation of a Cobalt-Derived Water Oxidation Electrocatalyst Developed in a Neutral HCO ₃ ⁻ /CO ₂ System. <i>Advanced Energy Materials</i> , 2014 , 4, 1400252	21.8	52
188	Photo-CIDNP MAS NMR in intact cells of Rhodobacter sphaeroides R26: molecular and atomic resolution at nanomolar concentration. <i>Journal of the American Chemical Society</i> , 2006 , 128, 12794-9	16.4	52
187	Protein-induced bonding perturbation of the rhodopsin chromophore detected by double-quantum solid-state NMR. <i>Journal of the American Chemical Society</i> , 2004 , 126, 3948-53	16.4	52
186	Photochemically induced dynamic nuclear polarization in photosystem I of plants observed by 13C magic-angle spinning NMR. <i>Journal of the American Chemical Society</i> , 2004 , 126, 12819-26	16.4	52
185	Ultrahigh field MAS NMR dipolar correlation spectroscopy of the histidine residues in light-harvesting complex II from photosynthetic bacteria reveals partial internal charge transfer in the B850/His complex. <i>Journal of the American Chemical Society</i> , 2001 , 123, 4803-9	16.4	51
184	15N MAS NMR studies of cph1 phytochrome: Chromophore dynamics and intramolecular signal transduction. <i>Journal of Physical Chemistry B</i> , 2006 , 110, 20580-5	3.4	49
183	Ab initio molecular dynamics of retinals. <i>Chemical Physics Letters</i> , 1996 , 248, 165-172	2.5	46
182	Ab initio molecular dynamics study of water oxidation reaction pathways in mono-Ru catalysts. <i>ChemPhysChem</i> , 2012 , 13, 140-6	3.2	45
181	Molecular Catalytic Assemblies for Electrodriven Water Splitting. <i>ChemPlusChem</i> , 2013 , 78, 35-47	2.8	45
180	Multidimensional CP-MAS 13C NMR of uniformly enriched chlorophyll. <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , 1998 , 54, 1167-1176	4.4	45
179	Residual backbone and side-chain 13C and 15N resonance assignments of the intrinsic transmembrane light-harvesting 2 protein complex by solid-state Magic Angle Spinning NMR spectroscopy. <i>Journal of Biomolecular NMR</i> , 2005 , 31, 279-93	3	45
178	Spectroscopy and quantum chemical modeling reveal a predominant contribution of excitonic interactions to the bathochromic shift in alpha-crustacyanin, the blue carotenoprotein in the carapace of the lobster Homarus gammarus. <i>Journal of the American Chemical Society</i> , 2005 , 127, 1438-45	16.4	44
177	Magnetic resonance microscopy of the adult zebrafish. <i>Zebrafish</i> , 2006 , 3, 431-9	2	44
176	Charge Localization and Dynamics in Rhodopsin. <i>Physical Review Letters</i> , 1996 , 77, 4474-4477	7.4	44
175	Structural variability in wild-type and bchQ bchR mutant chlorosomes of the green sulfur bacterium Chlorobaculum tepidum. <i>Biochemistry</i> , 2012 , 51, 4488-98	3.2	43
174	Large-scale overproduction, functional purification and ligand affinities of the His-tagged human histamine H1 receptor. <i>FEBS Journal</i> , 2004 , 271, 2636-46		43

173	Ultra-high-field MAS NMR assay of a multispin labeled ligand bound to its G-protein receptor target in the natural membrane environment: electronic structure of the retinylidene chromophore in rhodopsin. <i>Biochemistry</i> , 2001 , 40, 3282-8	3.2	43
172	¹³ C magic angle spinning NMR evidence for a 15,15'-cis configuration of the spheroidene in the Rhodobacter sphaeroides photosynthetic reaction center. <i>Biochemistry</i> , 1992 , 31, 12446-50	3.2	43
171	Crucial Role of Nuclear Dynamics for Electron Injection in a Dye-Semiconductor Complex. <i>Journal of Physical Chemistry Letters</i> , 2015 , 6, 2393-8	6.4	42
170	Assignment of amide proton signals by combined evaluation of HN, NN and HNCA MAS-NMR correlation spectra. <i>Journal of Biomolecular NMR</i> , 2003 , 25, 217-23	3	41
169	Magnetic resonance microscopy of mouse embryos in utero. <i>The Anatomical Record</i> , 2000 , 260, 373-7		41
168	A physical interpretation of the Floquet description of magic angle spinning nuclear magnetic resonance spectroscopy. <i>Molecular Physics</i> , 1998 , 95, 921-934	1.7	41
167	¹³ C magic angle spinning NMR characterization of the functionally asymmetric QA binding in Rhodobacter sphaeroides R26 photosynthetic reaction centers using site-specific ¹³ C-labeled ubiquinone-10. <i>Biochemistry</i> , 1995 , 34, 10229-36	3.2	41
166	Mechanism and Reaction Coordinate of Directional Charge Separation in Bacterial Reaction Centers. <i>Journal of Physical Chemistry Letters</i> , 2012 , 3, 694-7	6.4	39
165	A 3-D structural model of solid self-assembled chlorophyll a/H(2)O from multispin labeling and MAS NMR 2-D dipolar correlation spectroscopy in high magnetic field. <i>Journal of Magnetic Resonance</i> , 2002 , 155, 1-14	3	39
164	Characterization of pheophytin ground states in Rhodobacter sphaeroides R26 photosynthetic reaction centers from multispin pheophytin enrichment and 2-D ¹³ C MAS NMR dipolar correlation spectroscopy. <i>Biochemistry</i> , 1997 , 36, 7513-9	3.2	38
163	Accurate measurements of ¹³ C- ¹³ C J-couplings in the rhodopsin chromophore by double-quantum solid-state NMR spectroscopy. <i>Journal of the American Chemical Society</i> , 2006 , 128, 3878-9	16.4	38
162	Exploring the calcium-binding site in photosystem II membranes by solid-state (¹¹³)Cd NMR. <i>Biochemistry</i> , 2000 , 39, 6751-5	3.2	38
161	Anomalous rotational resonance spectra in magic-angle spinning NMR. <i>Journal of Magnetic Resonance</i> , 1999 , 140, 379-403	3	38
160	Solid-state NMR evidence for a protonation switch in the binding pocket of the H1 receptor upon binding of the agonist histamine. <i>Journal of the American Chemical Society</i> , 2007 , 129, 867-72	16.4	36
159	High-field (40 T) magnetization studies of linear Heisenberg chains with alternating exchange. <i>Journal of Applied Physics</i> , 1982 , 53, 8038-8039	2.5	36
158	Surface-Immobilized Single-Site Iridium Complexes for Electrocatalytic Water Splitting. <i>Angewandte Chemie</i> , 2012 , 124, 9739-9743	3.6	34
157	Observation of the solid-state photo-CIDNP effect in entire cells of cyanobacteria Synechocystis. <i>Photosynthesis Research</i> , 2010 , 104, 275-82	3.7	34
156	The transition state in the isomerization of rhodopsin. <i>Chemical Physics Letters</i> , 1998 , 294, 447-453	2.5	34

155	Solid state ¹³ C NMR spectroscopy on EPDM/PP/oil based thermoplastic vulcanizates in the melt. <i>Polymer</i> , 2001 , 42, 9745-9752	3.9	34
154	Artificial leaf goes simpler and more efficient for solar fuel generation. <i>ChemSusChem</i> , 2014 , 7, 73-6	8.3	33
153	Internuclear Distance Measurements up to 0.44 nm for Retinals in the Solid State with 1-D Rotational Resonance ¹³ C MAS NMR Spectroscopy. <i>Journal of the American Chemical Society</i> , 1997 , 119, 169-174	16.4	33
152	MAS NMR structure of a microcrystalline Cd-bacteriochlorophyll d analogue. <i>Journal of the American Chemical Society</i> , 2003 , 125, 13374-5	16.4	33
151	Retinal-Based Proton Pumping in the Near Infrared. <i>Journal of the American Chemical Society</i> , 2017 , 139, 2338-2344	16.4	32
150	Magnetic resonance microscopy at 17.6-Tesla on chicken embryos in vitro. <i>Journal of Magnetic Resonance Imaging</i> , 2001 , 14, 83-6	5.6	32
149	Monitoring blood flow alterations in the Tg2576 mouse model of Alzheimer's disease by in vivo magnetic resonance angiography at 17.6 T. <i>NeuroImage</i> , 2012 , 60, 958-66	7.9	31
148	Biomimetic molecular water splitting catalysts for hydrogen generation. <i>International Journal of Hydrogen Energy</i> , 2012 , 37, 8787-8799	6.7	31
147	¹³ C chemical shift map of the active cofactors in photosynthetic reaction centers of Rhodobacter sphaeroides revealed by photo-CIDNP MAS NMR. <i>Biochemistry</i> , 2007 , 46, 8953-60	3.2	31
146	2D(¹³ C)-(¹³ C) MAS NMR correlation spectroscopy with mixing by true (¹ H) spin diffusion reveals long-range intermolecular distance restraints in ultra high magnetic field. <i>Journal of Magnetic Resonance</i> , 2002 , 157, 286-91	3	31
145	Photo-CIDNP solid-state NMR on photosystems I and II: what makes P680 special?. <i>Photosynthesis Research</i> , 2005 , 84, 303-8	3.7	31
144	Protein-chromophore interactions in alpha-crustacyanin, the major blue carotenoprotein from the carapace of the lobster, Homarus gammarus. A study by ¹³ C magic angle spinning NMR. <i>FEBS Letters</i> , 1995 , 362, 34-8	3.8	31
143	Phase diagrams of weakly anisotropic Heisenberg antiferromagnets, nonlinear excitations (solitons) and random-field effects. <i>Physica B: Physics of Condensed Matter & C: Atomic, Molecular and Plasma Physics, Optics</i> , 1986 , 141, 1-36		31
142	Efficient electrochemical water oxidation in neutral and near-neutral systems with a nanoscale silver-oxide catalyst. <i>Nanoscale</i> , 2016 , 8, 15033-40	7.7	28
141	T(1) relaxation in in vivo mouse brain at ultra-high field. <i>Magnetic Resonance in Medicine</i> , 2007 , 58, 390-54.4		28
140	Biosynthetic site-specific (¹³) C labeling of the light-harvesting 2 protein complex: a model for solid state NMR structure determination of transmembrane proteins. <i>Journal of Biomolecular NMR</i> , 2004 , 30, 267-74	3	28
139	MAS NMR Structures of Aggregated Cadmium Chlorins Reveal Molecular Control of Self-Assembly of Chlorosomal Bacteriochlorophylls. <i>Journal of Physical Chemistry B</i> , 2004 , 108, 16556-16566	3.4	28
138	Multiple-spin effects in fast magic angle spinning Lee-Goldburg cross-polarization experiments in uniformly labeled compounds. <i>Journal of Chemical Physics</i> , 2003 , 118, 5547-5557	3.9	28

137	Electrochemical in situ surface enhanced Raman spectroscopic characterization of a trinuclear ruthenium complex, Ru-red. <i>Journal of Raman Spectroscopy</i> , 2013 , 44, 1195-1199	2.3	27
136	Magnetic properties of PrCo ₂ and its ternary hydride PrCo ₂ H ₄ . <i>Journal of Magnetism and Magnetic Materials</i> , 1981 , 25, 207-214	2.8	26
135	In vivo metabolite profile of adult zebrafish brain obtained by high-resolution localized magnetic resonance spectroscopy. <i>Journal of Magnetic Resonance Imaging</i> , 2009 , 29, 275-81	5.6	25
134	¹³ C Magic angle spinning NMR analysis and quantum chemical modeling of the bathochromic shift of astaxanthin in alpha-carotene, the blue carotenoprotein complex in the carapace of the lobster <i>Homarus gammarus</i> . <i>Biochemistry</i> , 1997 , 36, 7288-96	3.2	25
133	Selective chemical shift assignment of B800 and B850 bacteriochlorophylls in uniformly [¹³ C, ¹⁵ N]-labeled light-harvesting complexes by solid-state NMR spectroscopy at ultra-high magnetic field. <i>Journal of the American Chemical Society</i> , 2005 , 127, 3213-9	16.4	25
132	Modulation of spectral properties and pump activity of proteorhodopsins by retinal analogues. <i>Biochemical Journal</i> , 2015 , 467, 333-43	3.8	24
131	Photochemically induced dynamic nuclear polarization in the reaction center of the green sulphur bacterium <i>Chlorobium tepidum</i> observed by ¹³ C MAS NMR. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , 2007 , 1767, 610-5	4.6	24
130	Selective interface detection: mapping binding site contacts in membrane proteins by NMR spectroscopy. <i>Journal of the American Chemical Society</i> , 2005 , 127, 5734-5	16.4	24
129	¹³ C Magic angle spinning NMR evidence for a 15,15E configuration of the spheroidene chromophore in the <i>Rhodobacter sphaeroides</i> reaction center; synthesis of ¹³ C- and ² H-labelled spheroidenes. <i>Pure and Applied Chemistry</i> , 1991 , 63, 115-122	2.1	24
128	Proton displacements coupled to primary electron transfer in the <i>Rhodobacter sphaeroides</i> reaction center. <i>Journal of Physical Chemistry B</i> , 2013 , 117, 11162-8	3.4	23
127	Structure determination of a bio-inspired self-assembled light-harvesting antenna by solid-state NMR and molecular modeling. <i>Journal of Physical Chemistry B</i> , 2013 , 117, 11292-8	3.4	23
126	Mössbauer relaxation studies of non-linear dynamical excitations in low-dimensional magnets. <i>Hyperfine Interactions</i> , 1986 , 27, 93-110	0.8	23
125	An NMR comparison of the light-harvesting complex II (LHCII) in active and photoprotective states reveals subtle changes in the chlorophyll a ground-state electronic structures. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , 2013 , 1827, 738-44	4.6	22
124	On the morphology of a discotic liquid crystalline charge transfer complex. <i>Journal of Physical Chemistry B</i> , 2012 , 116, 13098-105	3.4	22
123	Magic-Angle Spinning Nuclear Magnetic Resonance under Ultrahigh Field Reveals Two Forms of Intermolecular Interaction within CH ₂ Cl ₂ -Treated (31R)-Type Bacteriochlorophyll c Solid Aggregate. <i>Journal of Physical Chemistry B</i> , 2004 , 108, 2726-2734	3.4	22
122	Solid-State ¹³ C NMR Study of Accelerated-Sulfur-Vulcanized ¹³ C-Labeled ENBEPDM. <i>Macromolecules</i> , 2002 , 35, 1958-1966	5.5	22
121	¹³ C MAS NMR evidence for a homogeneously ordered environment of tyrosine M210 in reaction centres of <i>Rhodobacter sphaeroides</i> . <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , 1995 , 51, 135-144	4.4	22
120	Mössbauer relaxation study of nonlinear excitations in pure and impure Ising-type ferromagnetic quantum chains. <i>Physical Review B</i> , 1984 , 30, 4041-4044	3.3	21

119	The associative nature of adenylyl transfer catalyzed by T4 DNA ligase. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2008 , 105, 8563-8	11.5	20
118	Ab Initio Modeling of the Spatial, Electronic, and Vibrational Structure of Schiff Base Models for Visual Photoreceptors. <i>Journal of Physical Chemistry B</i> , 2004 , 108, 13560-13572	3.4	20
117	Photo-CIDNP ¹³ C magic angle spinning NMR on bacterial reaction centres: exploring the electronic structure of the special pair and its surroundings. <i>Biological Chemistry</i> , 2001 , 382, 1271-6	4.5	20
116	Magic-angle-spinning ¹³ C NMR with atomic resolution of a photosynthetic reaction center enriched in [4,7- ¹³ C]tyrosine. <i>Chemical Physics Letters</i> , 1990 , 169, 307-310	2.5	20
115	In-Silico Design of a Donor-Antenna-Acceptor Supramolecular Complex for Photoinduced Charge Separation. <i>Journal of Physical Chemistry C</i> , 2014 , 118, 15600-15609	3.8	19
114	Solid-state NMR applied to photosynthetic light-harvesting complexes. <i>Photosynthesis Research</i> , 2012 , 111, 219-26	3.7	19
113	A Dynamic View of Proton-Coupled Electron Transfer in Photocatalytic Water Splitting. <i>Journal of Physical Chemistry C</i> , 2016 , 120, 23074-23082	3.8	19
112	Differential charge polarization of axial histidines in bacterial reaction centers balances the asymmetry of the special pair. <i>Journal of the American Chemical Society</i> , 2009 , 131, 9626-7	16.4	18
111	The mechanism of the colour shift of astaxanthin in β-carotene as investigated by ¹³ C MAS NMR and specific isotope enrichment. <i>Pure and Applied Chemistry</i> , 1997 , 69, 2085-2090	2.1	18
110	Protein-induced geometric constraints and charge transfer in bacteriochlorophyll-histidine complexes in LH2. <i>Physical Chemistry Chemical Physics</i> , 2008 , 10, 6971-8	3.6	18
109	High resolution localized two-dimensional MR spectroscopy in mouse brain in vivo. <i>Magnetic Resonance in Medicine</i> , 2008 , 60, 449-56	4.4	18
108	Solid-state NMR analysis of ligand-receptor interactions reveals an induced misfit in the binding site of isorhodopsin. <i>Biochemistry</i> , 2004 , 43, 16011-8	3.2	18
107	Rotational resonance NMR of ¹³ C ₂ -labelled retinal: quantitative internuclear distance determination. <i>Solid State Nuclear Magnetic Resonance</i> , 1999 , 14, 81-90	3.1	18
106	Magic Angle Spinning (MAS) NMR: a new tool to study the spatial and electronic structure of photosynthetic complexes. <i>Photosynthesis Research</i> , 2009 , 102, 415-25	3.7	17
105	Characterisation of uniformly ¹³ C, ¹⁵ N labelled bacteriochlorophyll a and bacteriopheophytin a in solution and in solid state: complete assignment of the ¹³ C, ¹ H and ¹⁵ N chemical shifts. <i>Magnetic Resonance in Chemistry</i> , 2008 , 46, 1074-83	2.1	17
104	Methyl substituents at the 11 or 12 position of retinal profoundly and differentially affect photochemistry and signalling activity of rhodopsin. <i>Journal of Molecular Biology</i> , 2006 , 363, 98-113	6.5	17
103	Phase diagrams of weakly anisotropic Heisenberg antiferromagnets: I. Quasi 1-dimensional systems. <i>Solid State Communications</i> , 1985 , 53, 731-735	1.6	17
102	Nuclear magnetic resonance secondary shifts of a light-harvesting 2 complex reveal local backbone perturbations induced by its higher-order interactions. <i>Biochemistry</i> , 2010 , 49, 478-86	3.2	16

101	Phase diagrams of weakly anisotropic Heisenberg antiferromagnets: II. Quasi 2-dimensional systems. <i>Solid State Communications</i> , 1985 , 53, 737-741	1.6	16
100	First solid-state NMR analysis of uniformly ¹³ C-enriched major light-harvesting complexes from <i>Chlamydomonas reinhardtii</i> and identification of protein and cofactor spin clusters. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , 2011 , 1807, 437-43	4.6	15
99	Prospects for early detection of Alzheimer's disease from serial MR images in transgenic mice. <i>Current Alzheimer Research</i> , 2009 , 6, 503-18	3	15
98	Resonance raman spectroscopy and quantum chemical modeling studies of protein-astaxanthin interactions in alpha-crustacyanin (major blue carotenoprotein complex in carapace of lobster, <i>Homarus gammarus</i>). <i>Biospectroscopy</i> , 1999 , 5, 358-70		15
97	Contrasting Modes of Self-Assembly and Hydrogen-Bonding Heterogeneity in Chlorosomes of. <i>Journal of Physical Chemistry C</i> , 2018 , 122, 14877-14888	3.8	15
96	Heteronuclear 2D (1H-13C) MAS NMR resolves the electronic structure of coordinated histidines in light-harvesting complex II: assessment of charge transfer and electronic delocalization effect. <i>Journal of Biomolecular NMR</i> , 2004 , 28, 157-64	3	14
95	13C NMR Study of the grafting of 13C labeled maleic anhydride onto PE, PP and EPM. <i>Macromolecular Symposia</i> , 1998 , 129, 119-125	0.8	14
94	Photocatalytic Water Splitting Cycle in a Dye-Catalyst Supramolecular Complex: Ab Initio Molecular Dynamics Simulations. <i>Journal of Physical Chemistry C</i> , 2019 , 123, 21403-21414	3.8	13
93	Symmetry break of special pair: photochemically induced dynamic nuclear polarization NMR confirms control by nonaromatic substituents. <i>Journal of the American Chemical Society</i> , 2013 , 135, 10382-7	16.4	13
92	In vivo magnetic resonance imaging to detect malignant melanoma in adult zebrafish. <i>Zebrafish</i> , 2010 , 7, 143-8	2	13
91	Acetyl group orientation modulates the electronic ground-state asymmetry of the special pair in purple bacterial reaction centers. <i>Physical Chemistry Chemical Physics</i> , 2011 , 13, 10270-9	3.6	13
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