

Guanines are a quartet's best friend: impact of base substitution on the stability of tetramolecular quadruplexes

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Citation Report

#	ARTICLE	IF	CITATIONS
1	Human telomere, oncogenic promoter and 5'-UTR G-quadruplexes: diverse higher order DNA and RNA targets for cancer therapeutics. <i>Nucleic Acids Research</i> , 2007, 35, 7429-7455.	6.5	812
3	Gas-phase stability of G-quadruplex DNA determined by electrospray ionization tandem mass spectrometry and molecular dynamics simulations. <i>Journal of the American Society for Mass Spectrometry</i> , 2007, 18, 1760-1773.	1.2	33
4	Guanine quadruplex formation by RNA/DNA hybrid analogs of <i>Oxytricha</i> telomere G ₄ T ₄ G ₄ fragment. <i>Biopolymers</i> , 2008, 89, 797-806.	1.2	10
5	Synthesis, structural studies and biological properties of new TBA analogues containing an acyclic nucleotide. <i>Bioorganic and Medicinal Chemistry</i> , 2008, 16, 8244-8253.	1.4	44
6	Role of loops in the guanine quadruplex formation by DNA/RNA hybrid analogs of G4T4G4. <i>International Journal of Biological Macromolecules</i> , 2008, 43, 463-467.	3.6	7
7	Electrospray mass spectrometry to study drug-nucleic acids interactions. <i>Biochimie</i> , 2008, 90, 1074-1087.	1.3	142
8	Sequence effects in single-base loops for quadruplexes. <i>Biochimie</i> , 2008, 90, 686-696.	1.3	89
9	The formation pathway of tetramolecular G-quadruplexes. <i>Nucleic Acids Research</i> , 2008, 36, 477-488.	6.5	86
10	A further contribution to the extreme variability of quadruplex structures from oligodeoxyribonucleotides containing inversion of polarity sites in the G-tract. <i>Molecular BioSystems</i> , 2008, 4, 426.	2.9	19
11	8-Amino guanine accelerates tetramolecular G-quadruplex formation. <i>Chemical Communications</i> , 2008, , 2926.	2.2	32
12	Redesigned tetrads with altered hydrogen bonding patterns enable programming of quadruplex topologies. <i>Chemical Communications</i> , 2008, , 4010.	2.2	21
13	Assembling of G-strands into novel tetra-molecular parallel G4-DNA nanostructures using avidin-biotin recognition. <i>Nucleic Acids Research</i> , 2008, 36, 5050-5060.	6.5	57
14	Probes containing runs of guanines provide insights into the biophysics and bioinformatics of Affymetrix GeneChips. <i>Briefings in Bioinformatics</i> , 2008, 10, 259-277.	3.2	25
15	Telomeric D-loops Containing 8-Oxo-2'-deoxyguanosine Are Preferred Substrates for Werner and Bloom Syndrome Helicases and Are Bound by POT1. <i>Journal of Biological Chemistry</i> , 2009, 284, 31074-31084.	1.6	51
16	The disruptive positions in human G-quadruplex motifs are less polymorphic and more conserved than their neutral counterparts. <i>Nucleic Acids Research</i> , 2009, 37, 5749-5756.	6.5	58
17	Sequence variant (CTAGGG) _n in the human telomere favors a G-quadruplex structure containing a G _A -C _A -G _A -C tetrad. <i>Nucleic Acids Research</i> , 2009, 37, 6239-6248.	6.5	132
18	Stability of intramolecular quadruplexes: sequence effects in the central loop. <i>Nucleic Acids Research</i> , 2009, 37, 5559-5567.	6.5	72
20	A Ditopic Ion-Pair Receptor Based on Stacked Nucleobase Quartets. <i>Angewandte Chemie - International Edition</i> , 2009, 48, 3285-3287.	7.2	70

#	ARTICLE	IF	CITATIONS
21	Evaluation of binding selectivities and affinities of platinum-based quadruplex interactive complexes by electrospray ionization mass spectrometry. <i>Biopolymers</i> , 2009, 91, 233-243.	1.2	29
22	Effects of the introduction of inversion of polarity sites in the quadruplex forming oligonucleotide TGGCT. <i>Bioorganic and Medicinal Chemistry</i> , 2009, 17, 1997-2001.	1.4	31
23	A novel intramolecular G-quartet-containing fold of single-stranded d(GT) ₈ and d(GT) ₁₆ oligonucleotides. <i>Biophysical Chemistry</i> , 2009, 143, 161-165.	1.5	4
24	Substitution of adenine for guanine in the quadruplex-forming human telomere DNA sequence G3(T2AG3) ₃ . <i>Biochimie</i> , 2009, 91, 171-179.	1.3	38
25	Colorimetric Split G-Quadruplex Probes for Nucleic Acid Sensing: Improving Reconstituted DNAzyme's Catalytic Efficiency via Probe Remodeling. <i>Journal of the American Chemical Society</i> , 2009, 131, 10320-10333.	6.6	194
26	Single Stranded Loops of Quadruplex DNA As Key Benchmark for Testing Nucleic Acids Force Fields. <i>Journal of Chemical Theory and Computation</i> , 2009, 5, 2514-2530.	2.3	121
27	NMR spectroscopy and kinetic studies of the quadruplex forming RNA r(UGGAGGU). <i>Molecular BioSystems</i> , 2009, 5, 1347.	2.9	12
28	Hybridization of short complementary PNAs to G-quadruplex forming oligonucleotides: An electrospray mass spectrometry study. <i>Biopolymers</i> , 2009, 91, 244-255.	1.2	34
29	Frontiers of Mass Spectrometry in Nucleic Acids Analysis. <i>European Journal of Mass Spectrometry</i> , 2010, 16, 351-365.	0.5	12
30	Adenine versus guanine quartets in aqueous solution: dispersion-corrected DFT study on the differences in π -stacking and hydrogen-bonding behavior. <i>Theoretical Chemistry Accounts</i> , 2010, 125, 245-252.	0.5	123
31	Quadruplexes of human telomere DNA analogs designed to contain G:A:G:A, G:G:A:A, and A:A:A:A tetrads. <i>Biopolymers</i> , 2010, 93, 880-886.	1.2	13
32	A study of the interactions that stabilize DNA frayed wires. <i>Biophysical Chemistry</i> , 2010, 147, 123-129.	1.5	19
33	Structure, location and interactions of G-quadruplexes. <i>FEBS Journal</i> , 2010, 277, 3452-3458.	2.2	208
34	A Toolbox for Predicting G-Quadruplex Formation and Stability. <i>Journal of Nucleic Acids</i> , 2010, 2010, 1-6.	0.8	47
35	Synthesis and G-Quadruplex-Binding Properties of Defined Acridine Oligomers. <i>Journal of Nucleic Acids</i> , 2010, 2010, 1-10.	0.8	7
36	Tetramolecular G-quadruplex formation pathways studied by electrospray mass spectrometry. <i>Nucleic Acids Research</i> , 2010, 38, 5217-5225.	6.5	90
37	Effects of abasic sites on structural, thermodynamic and kinetic properties of quadruplex structures. <i>Nucleic Acids Research</i> , 2010, 38, 2069-2080.	6.5	34
38	Overview of Formation of G-Quadruplex Structures. <i>Current Protocols in Nucleic Acid Chemistry</i> , 2010, 40, Unit 17.2.1-17.	0.5	34

#	ARTICLE	IF	CITATIONS
39	Cation-Mediated Energy Transfer in G-Quadruplexes Revealed by an Internal Fluorescent Probe. <i>Journal of the American Chemical Society</i> , 2010, 132, 18004-18007.	6.6	76
40	Thermal Melting Studies of Ligand DNA Interactions. <i>Methods in Molecular Biology</i> , 2010, 613, 25-35.	0.4	44
41	Electrospray Mass Spectrometry of Telomeric RNA (TERRA) Reveals the Formation of Stable Multimeric G-Quadruplex Structures. <i>Journal of the American Chemical Society</i> , 2010, 132, 9328-9334.	6.6	124
42	Label-Free Probing of G-Quadruplex Formation by Surface-Enhanced Raman Scattering. <i>Analytical Chemistry</i> , 2011, 83, 6849-6855.	3.2	56
43	Effects of Site-Specific Guanine C8-Modifications on an Intramolecular DNA G-Quadruplex. <i>Biophysical Journal</i> , 2011, 101, 1987-1998.	0.2	48
44	The application of DNA and RNA G-quadruplexes to therapeutic medicines. <i>Chemical Society Reviews</i> , 2011, 40, 5867.	18.7	530
45	Insight into G-DNA Structural Polymorphism and Folding from Sequence and Loop Connectivity through Free Energy Analysis. <i>Journal of the American Chemical Society</i> , 2011, 133, 14270-14279.	6.6	58
46	Self-Assembled G4-DNA-Silver Nanoparticle Structures. <i>Bioconjugate Chemistry</i> , 2011, 22, 482-487.	1.8	21
47	Effects of 8-methylguanine on structure, stability and kinetics of formation of tetramolecular quadruplexes. <i>Biochimie</i> , 2011, 93, 399-408.	1.3	47
48	Acridine and quindoline oligomers linked through a 4-aminoproline backbone prefer G-quadruplex structures. <i>Biochimica Et Biophysica Acta - General Subjects</i> , 2011, 1810, 769-776.	1.1	14
49	3-Substituted xanthenes as promising candidates for quadruplex formation: computational, synthetic and analytical studies. <i>New Journal of Chemistry</i> , 2011, 35, 476-482.	1.4	36
50	Dual or Triple Activation of TLR7, TLR8, and/or TLR9 by Single-Stranded Oligoribonucleotides. <i>Nucleic Acid Therapeutics</i> , 2011, 21, 423-436.	2.0	21
51	Mass spectrometry of G-quadruplex DNA: Formation, recognition, property, conversion, and conformation. <i>Mass Spectrometry Reviews</i> , 2011, 30, 1121-1142.	2.8	74
52	Fluorescence Properties of 8-(2-Pyridyl)guanine as Compared to 2-Aminopurine in DNA. <i>ChemBioChem</i> , 2011, 12, 2044-2051.	1.3	14
53	Modulation of i-motif thermodynamic stability by the introduction of UNA (unlocked nucleic acid) monomers. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2011, 21, 752-755.	1.0	33
54	Electrochemistry-electrospray ionization FT ICR mass spectrometry (EC ESI MS) of guanine-tyrosine and guanine-glutathione crosslinks formed on-line. <i>Electrochimica Acta</i> , 2011, 56, 2633-2640.	2.6	16
55	Highly fluorescent guanosine mimics for folding and energy transfer studies. <i>Nucleic Acids Research</i> , 2011, 39, 6825-6834.	6.5	61
56	Improved thrombin binding aptamer by incorporation of a single unlocked nucleic acid monomer. <i>Nucleic Acids Research</i> , 2011, 39, 1155-1164.	6.5	155

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57	The insertion of two 8-methyl-2â€²-deoxyguanosine residues in tetramolecular quadruplex structures: trying to orientate the strands. <i>Nucleic Acids Research</i> , 2012, 40, 461-475.	6.5	73
58	Strand directionality affects cation binding and movement within tetramolecular G-quadruplexes. <i>Nucleic Acids Research</i> , 2012, 40, 11047-11057.	6.5	39
60	Triâ€¢Gâ€¢Quadruplex: Controlled Assembly of a Gâ€¢Quadruplex Structure from Three Gâ€¢Rich Strands. <i>Angewandte Chemie - International Edition</i> , 2012, 51, 11002-11005.	7.2	65
61	Molecular dynamics simulations of G-DNA and perspectives on the simulation of nucleic acid structures. <i>Methods</i> , 2012, 57, 25-39.	1.9	111
62	d(TGnT) DNA sequences do not necessarily form tetramolecular G-quadruplexes. <i>Chemical Communications</i> , 2012, 48, 8386.	2.2	19
63	Biocompatible Xanthine-Quadruplex Scaffold for Ion-Transporting DNA Channels. <i>Journal of Physical Chemistry Letters</i> , 2012, 3, 1788-1792.	2.1	23
64	Tetramolecular Quadruplex Stability and Assembly. <i>Topics in Current Chemistry</i> , 2012, 330, 243-273.	4.0	53
65	An In Silico Study of the Differential Effect of Oxidation on Two Biologically Relevant G-Quadruplexes: Possible Implications in Oncogene Expression. <i>PLoS ONE</i> , 2012, 7, e43735.	1.1	12
66	Synthesis, DNA-Binding and Antiproliferative Properties of Acridine and 5-Methylacridine Derivatives. <i>Molecules</i> , 2012, 17, 7067-7082.	1.7	24
67	Synthesis and Structural Characterization of Stable Branched DNA Gâ€¢Quadruplexes Using the Trebler Phosphoramidite. <i>ChemistryOpen</i> , 2012, 1, 106-114.	0.9	13
68	Coexistence of G-quadruplex and duplex domains within the secondary structure of 31-mer DNA thrombin-binding aptamer. <i>Journal of Biomolecular Structure and Dynamics</i> , 2012, 30, 524-531.	2.0	27
69	61ST ASMS Conference on Mass Spectrometry and Allied Topics. <i>Journal of the American Society for Mass Spectrometry</i> , 2013, 24, 1-254.	1.2	21
70	Quadruplex Nucleic Acids. <i>Topics in Current Chemistry</i> , 2013, , .	4.0	11
71	Catalytic DNAs That Harness Violet Light To Repair Thymine Dimers in a DNA Substrate. <i>Journal of the American Chemical Society</i> , 2013, 135, 2596-2603.	6.6	21
72	Ammonium Ion Binding to DNA G-Quadruplexes: Do Electrospray Mass Spectra Faithfully Reflect the Solution-Phase Species?. <i>Journal of the American Society for Mass Spectrometry</i> , 2013, 24, 1-8.	1.2	74
73	Thermal stabilisation of RNAâ€¢RNA duplexes and G-quadruplexes by phosphorothiolate linkages. <i>Organic and Biomolecular Chemistry</i> , 2013, 11, 966-974.	1.5	6
74	Effect of Guanine to Inosine Substitution on Stability of Canonical DNA and RNA Duplexes: Molecular Dynamics Thermodynamics Integration Study. <i>Journal of Physical Chemistry B</i> , 2013, 117, 1872-1879.	1.2	42
75	Molecular Engineering of Guanine-Rich Sequences: Z-DNA, DNA Triplexes, and G-Quadruplexes. <i>Chemical Reviews</i> , 2013, 113, 3044-3083.	23.0	166

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76	Fluorescent Probes for G-Quadruplex Structures. <i>ChemBioChem</i> , 2013, 14, 540-558.	1.3	221
77	Relative Stability of Different DNA Guanine Quadruplex Stem Topologies Derived Using Large-Scale Quantum-Chemical Computations. <i>Journal of the American Chemical Society</i> , 2013, 135, 9785-9796.	6.6	108
78	Guided Assembly of Tetramolecular G-Quadruplexes. <i>ACS Nano</i> , 2013, 7, 5701-5710.	7.3	46
79	A α -sugar-deficient G-quadruplex: incorporation of aTNA in G4 structures. <i>Chemical Science</i> , 2013, 4, 3693.	3.7	15
80	The high kinetic stability of a G-quadruplex limits hnRNP F qRRM3 binding to G-tract RNA. <i>Nucleic Acids Research</i> , 2013, 41, 2505-2516.	6.5	48
81	Structural dynamics of possible late-stage intermediates in folding of quadruplex DNA studied by molecular simulations. <i>Nucleic Acids Research</i> , 2013, 41, 7128-7143.	6.5	111
82	Large mixed complexes involving uracil, cytosine, thymine and/or 1-methyl uracil around Ca^{2+} ions: an electrospray ionization/MS study. <i>Journal of Mass Spectrometry</i> , 2013, 48, 438-447.	0.7	3
83	Effects of Six-Membered Carbohydrate Rings on Structure, Stability, and Kinetics of G-Quadruplexes. <i>Chemistry - A European Journal</i> , 2013, 19, 14719-14725.	1.7	9
84	Sugar-modified G-quadruplexes: effects of LNA-, 2'-F-RNA and 2'-F-ANA-guanosine chemistries on G-quadruplex structure and stability. <i>Nucleic Acids Research</i> , 2014, 42, 4068-4079.	6.5	42
85	Distinctive structural motifs of RNA G-quadruplexes composed of AGG, CGG and UGG trinucleotide repeats. <i>Nucleic Acids Research</i> , 2014, 42, 10196-10207.	6.5	58
86	Associations between intronic non-B DNA structures and exon skipping. <i>Nucleic Acids Research</i> , 2014, 42, 739-747.	6.5	8
87	α -Nano-oddities: Unusual Nucleic Acid Assemblies for DNA-Based Nanostructures and Nanodevices. <i>Accounts of Chemical Research</i> , 2014, 47, 1836-1844.	7.6	123
88	A Twisting Electronic Nanoswitch Made of DNA. <i>Angewandte Chemie - International Edition</i> , 2014, 53, 14055-14059.	7.2	17
89	Oligonucleotide Analogues with Integrated Bases and Backbone. Part 32. <i>Helvetica Chimica Acta</i> , 2014, 97, 1244-1268.	1.0	1
90	Native Electrospray Mass Spectrometry of DNA G-Quadruplexes in Potassium Solution. <i>Journal of the American Society for Mass Spectrometry</i> , 2014, 25, 1146-1154.	1.2	70
91	Real-time analysis of self-assembled nucleobases by Venturi easy ambient sonic-spray ionization mass spectrometry. <i>Talanta</i> , 2014, 128, 366-372.	2.9	15
92	Assembly of chemically modified G-rich sequences into tetramolecular DNA G-quadruplexes and higher order structures. <i>Methods</i> , 2014, 67, 159-168.	1.9	19
93	G-quadruplexes incorporating modified constituents: a review. <i>Journal of Biomolecular Structure and Dynamics</i> , 2014, 32, 477-511.	2.0	54

#	ARTICLE	IF	CITATIONS
95	Conformational diversity of single-stranded DNA from bacterial repetitive extragenic palindromes: Implications for the DNA recognition elements of transposases. <i>Biopolymers</i> , 2015, 103, 585-596.	1.2	8
96	NMR Detection and Characterization of I-quartets in Parallel DNA Quadruplexes. <i>Chemistry Letters</i> , 2015, 44, 1107-1109.	0.7	8
97	Xanthine and 8-oxoguanine in G-quadruplexes: formation of a G ₄ ·G ₄ ·X ₄ ·O tetrad. <i>Nucleic Acids Research</i> , 2015, 43, gkv826.	6.5	31
98	Interdependence of pyrene interactions and tetramolecular G4-DNA assembly. <i>Organic and Biomolecular Chemistry</i> , 2015, 13, 3742-3748.	1.5	16
99	Conformation-sensitive nucleoside analogues as topology-specific fluorescence turn-on probes for DNA and RNA G-quadruplexes. <i>Nucleic Acids Research</i> , 2015, 43, e149-e149.	6.5	58
100	G-quadruplexes: A possible epigenetic target for nutrition. <i>Mutation Research - Reviews in Mutation Research</i> , 2015, 764, 101-107.	2.4	16
101	Human Telomeric RNA G-Quadruplex Response to Point Mutation in the G-Quartets. <i>Journal of Physical Chemistry B</i> , 2015, 119, 4617-4627.	1.2	11
102	Structural and Energetic Impact of Non-Natural 7-Deaza-8-Azaadenine and Its 7-Substituted Derivatives on H-Bonding Potential with Uracil in RNA Molecules. <i>Journal of Physical Chemistry B</i> , 2015, 119, 12982-12989.	1.2	15
103	Hairpin oligonucleotides forming G-quadruplexes: New aptamers with anti-HIV activity. <i>European Journal of Medicinal Chemistry</i> , 2015, 89, 51-58.	2.6	27
104	Altered biochemical specificity of G-quadruplexes with mutated tetrads. <i>Nucleic Acids Research</i> , 2016, 44, 10789-10803.	6.5	14
105	Inverting the G ₄ Tetrad Polarity of a G ₄ Quadruplex by Using Xanthine and 8-Oxoguanine. <i>Angewandte Chemie - International Edition</i> , 2016, 55, 160-163.	7.2	29
106	The exception that confirms the rule: a higher-order telomeric G-quadruplex structure more stable in sodium than in potassium. <i>Nucleic Acids Research</i> , 2016, 44, 2926-2935.	6.5	35
107	Folate deficiency and DNA-methyltransferase inhibition modulate G-quadruplex frequency. <i>Mutagenesis</i> , 2016, 31, 409-416.	1.0	11
109	Role of Alkali Metal Ions in G-Quadruplex Nucleic Acid Structure and Stability. <i>Metal Ions in Life Sciences</i> , 2016, 16, 203-258.	2.8	129
110	A novel pyrimidine tetrad contributing to stabilize tetramolecular G-quadruplex structures. <i>Organic and Biomolecular Chemistry</i> , 2016, 14, 2938-2943.	1.5	4
111	Interactions of fluorescent dye SYBR Green I with natural and 7-deazaguanine-modified DNA studied by fluorescence and electrochemical methods. <i>Monatshefte für Chemie</i> , 2016, 147, 13-20.	0.9	5
112	What stoichiometries determined by mass spectrometry reveal about the ligand binding mode to G-quadruplex nucleic acids. <i>Biochimica Et Biophysica Acta - General Subjects</i> , 2017, 1861, 1353-1361.	1.1	33
113	Ball with hair: modular functionalization of highly stable G-quadruplex DNA nano-scaffolds through N2-guanine modification. <i>Nucleic Acids Research</i> , 2017, 45, 6265-6274.	6.5	11

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114	Theoretical study of gas and solvent phase stability and molecular adsorption of noncanonical guanine bases on graphene. <i>Physical Chemistry Chemical Physics</i> , 2017, 19, 16819-16830.	1.3	5
115	Synthesis and label free characterization of a bimolecular PNA homo quadruplex. <i>Biochimica Et Biophysica Acta - General Subjects</i> , 2017, 1861, 1222-1228.	1.1	8
116	A parallel stranded G-quadruplex composed of threose nucleic acid (TNA). <i>Biopolymers</i> , 2017, 107, e22999.	1.2	8
117	In What Ways Do Synthetic Nucleotides and Natural Base Lesions Alter the Structural Stability of G-Quadruplex Nucleic Acids?. <i>Journal of Nucleic Acids</i> , 2017, 2017, 1-45.	0.8	6
118	A novel G-quadruplex motif in the Human <i>MET</i> promoter region. <i>Bioscience Reports</i> , 2017, 37, .	1.1	4
119	DNA's Encounter with Ultraviolet Light: An Instinct for Self-Preservation?. <i>Accounts of Chemical Research</i> , 2018, 51, 526-533.	7.6	18
120	Mixed guanine, adenine base quartets: possible roles of protons and metal ions in their stabilization. <i>Journal of Biological Inorganic Chemistry</i> , 2018, 23, 41-49.	1.1	8
121	A Dual-App Nucleoside Probe Provides Structural Insights into the Human Telomeric Overhang in Live Cells. <i>Journal of the American Chemical Society</i> , 2018, 140, 12622-12633.	6.6	57
122	Base-modified fluorescent purine nucleosides and nucleotides for use in oligonucleotide probes. <i>Journal of Photochemistry and Photobiology C: Photochemistry Reviews</i> , 2018, 36, 48-73.	5.6	42
123	Fluorescence-based tools to probe G-quadruplexes in cell-free and cellular environments. <i>RSC Advances</i> , 2018, 8, 25673-25694.	1.7	33
124	Loop Length Affects Syn vs Anti Conformational Rearrangements in Parallel G-quadruplexes. <i>Chemistry - A European Journal</i> , 2018, 24, 10246-10252.	1.7	6
125	The diverse structural landscape of quadruplexes. <i>FEBS Letters</i> , 2019, 593, 2083-2102.	1.3	110
127	DNA and RNA telomeric G-quadruplexes: what topology features can be inferred from ion mobility mass spectrometry?. <i>Analyst</i> , 2019, 144, 6074-6088.	1.7	15
128	Probing G-quadruplex topologies and recognition concurrently in real time and 3D using a dual-app nucleoside probe. <i>Nucleic Acids Research</i> , 2019, 47, 6059-6072.	6.5	15
129	Setting boundaries for genome-wide heterochromatic DNA deletions through flanking inverted repeats in <i>Tetrahymena thermophila</i> . <i>Nucleic Acids Research</i> , 2019, 47, 5181-5192.	6.5	8
130	Structural and Energetic Impact of Non-natural 7-Deaza-8-azaguanine, 7-Deaza-8-azaisoguanine, and Their 7-Substituted Derivatives on Hydrogen Bond Pairing with Cytosine and Isocytosine. <i>ChemBioChem</i> , 2019, 20, 2262-2270.	1.3	4
131	DNA Quadruple Helices in Nanotechnology. <i>Chemical Reviews</i> , 2019, 119, 6290-6325.	23.0	269
132	Guanine-Quadruplexes and Possible Role in Nutritional Epigenetics and Aging. , 2019, , 293-309.		0

#	ARTICLE	IF	CITATIONS
133	A two-quartet G-quadruplex topology of human KIT2 is conformationally selected by a perylene derivative. <i>Biochimie</i> , 2020, 179, 77-84.	1.3	11
134	Synthesis of new riboflavin modified ODNs: Effect of riboflavin moiety on the G-quadruplex arrangement and stability. <i>Bioorganic Chemistry</i> , 2020, 104, 104213.	2.0	0
135	Stability of Two-Quartet G-Quadruplexes and Their Dimers in Atomistic Simulations. <i>Journal of Chemical Theory and Computation</i> , 2020, 16, 3447-3463.	2.3	16
136	Topologies of G-quadruplex: Biological functions and regulation by ligands. <i>Biochemical and Biophysical Research Communications</i> , 2020, 531, 3-17.	1.0	61
137	Integrative analysis reveals RNA G-quadruplexes in UTRs are selectively constrained and enriched for functional associations. <i>Nature Communications</i> , 2020, 11, 527.	5.8	65
138	Self-assembling purine and pteridine quartets: how do π -conjugation patterns affect resonance-assisted hydrogen bonding?. <i>Organic and Biomolecular Chemistry</i> , 2020, 18, 1078-1081.	1.5	4
139	PrÄazise Abstandsmessungen in DNAâ€Gâ€Quadruplexâ€Dimeren und Sandwichkomplexen Ä¼ber gepulste dipolare EPRâ€Spektroskopie. <i>Angewandte Chemie</i> , 2021, 133, 4991-4999.	1.6	3
140	Precise Distance Measurements in DNA Gâ€Quadruplex Dimers and Sandwich Complexes by Pulsed Dipolar EPR Spectroscopy. <i>Angewandte Chemie - International Edition</i> , 2021, 60, 4939-4947.	7.2	19
141	Oxidative lesions modulate G-quadruplex stability and structure in the human BCL2 promoter. <i>Nucleic Acids Research</i> , 2021, 49, 2346-2356.	6.5	17
142	DNA G-quadruplexes for native mass spectrometry in potassium: a database of validated structures in electrospray-compatible conditions. <i>Nucleic Acids Research</i> , 2021, 49, 2333-2345.	6.5	23
143	A stable uncompleted tetramolecular G-quadruplex formed by d(AGnA) under acidic condition. <i>International Journal of Biological Macromolecules</i> , 2021, 176, 66-71.	3.6	1
144	G-quadruplex structural variations in human genome associated with single-nucleotide variations and their impact on gene activity. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2021, 118, .	3.3	28
145	Differential responses of neurons, astrocytes, and microglia to G-quadruplex stabilization. <i>Aging</i> , 2021, 13, 15917-15941.	1.4	9
147	Impact of a Single Nucleotide Change or Non-Nucleoside Modifications in G-Rich Region on the Quadruplexâ€Duplex Hybrid Formation. <i>Biomolecules</i> , 2021, 11, 1236.	1.8	0
148	Native Mass Spectrometry and Nucleic Acid G-Quadruplex Biophysics: Advancing Hand in Hand. <i>Accounts of Chemical Research</i> , 2021, 54, 3691-3699.	7.6	12
149	Mass Spectrometry of Nucleic Acid Noncovalent Complexes. <i>Chemical Reviews</i> , 2022, 122, 7720-7839.	23.0	40
150	Combining Electrospray Mass Spectrometry (ESI-MS) and Computational Techniques in the Assessment of G-Quadruplex Ligands: A Hybrid Approach to Optimize Hit Discovery. <i>Journal of Medicinal Chemistry</i> , 2021, 64, 13174-13190.	2.9	3
151	Non-Canonical Helical Structure of Nucleic Acids Containing Base-Modified Nucleotides. <i>International Journal of Molecular Sciences</i> , 2021, 22, 9552.	1.8	9

#	ARTICLE	IF	CITATIONS
152	Non-B DNA: a major contributor to small- and large-scale variation in nucleotide substitution frequencies across the genome. <i>Nucleic Acids Research</i> , 2021, 49, 1497-1516.	6.5	70
153	Structure and Stability of Human Telomeric G-Quadruplex with Preclinical 9-Amino Acridines. <i>PLoS ONE</i> , 2013, 8, e57701.	1.1	21
154	The G-quadruplex DNA stabilizing drug pyridostatin promotes DNA damage and downregulates transcription of <i>Brcal</i> in neurons. <i>Aging</i> , 2017, 9, 1957-1970.	1.4	60
155	How to study G-quadruplex structures. <i>Biotechnologia</i> , 2012, 4, 381-390.	0.3	18
156	Small-molecule G-quadruplex stabilizers reveal a novel pathway of autophagy regulation in neurons. <i>ELife</i> , 2020, 9, .	2.8	60
157	Guanine-Quadruplexes and Possible Role in Nutritional Epigenetics and Aging. , 2017, , 1-17.		0
162	HNRNPH1 destabilizes the G-quadruplex structures formed by G-rich RNA sequences that regulate the alternative splicing of an oncogenic fusion transcript. <i>Nucleic Acids Research</i> , 2022, 50, 6474-6496.	6.5	14
163	Interaction between non-coding RNAs, mRNAs and G-quadruplexes. <i>Cancer Cell International</i> , 2022, 22, 171.	1.8	9
164	Properties of Parallel Tetramolecular G-Quadruplex Carrying N-Acetylgalactosamine as Potential Enhancer for Oligonucleotide Delivery to Hepatocytes. <i>Molecules</i> , 2022, 27, 3944.	1.7	1
166	8-Oxoguanine Forms Quartets with a Large Central Cavity. <i>Biochemistry</i> , 2022, 61, 2390-2397.	1.2	3
167	A Spectroscopic Approach to Unravel the Local Conformations of a G-Quadruplex Using CD-Active Fluorescent Base Analogues. <i>Biochemistry</i> , 2022, 61, 2720-2732.	1.2	0
168	Homopurine guanine-rich sequences in complex with N-methyl mesoporphyrin IX form parallel G-quadruplex dimers and display a unique symmetry tetrad. <i>Bioorganic and Medicinal Chemistry</i> , 2023, 77, 117112.	1.4	3
169	Crosstalk between G-quadruplex and ROS. <i>Cell Death and Disease</i> , 2023, 14, .	2.7	13