

# Kent S Gates

## List of Publications by Year in descending order

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148  
papers

5,015  
citations

81900

39  
h-index

114465

63  
g-index

153  
all docs

153  
docs citations

153  
times ranked

4334  
citing authors

#	ARTICLE	IF	CITATIONS
1	An Overview of Chemical Processes That Damage Cellular DNA: Spontaneous Hydrolysis, Alkylation, and Reactions with Radicals. <i>Chemical Research in Toxicology</i> , 2009, 22, 1747-1760.	3.3	388
2	Biologically Relevant Chemical Reactions of N7-Alkylguanine Residues in DNA. <i>Chemical Research in Toxicology</i> , 2004, 17, 839-856.	3.3	223
3	Redox Regulation of Protein Tyrosine Phosphatases: Structural and Chemical Aspects. <i>Antioxidants and Redox Signaling</i> , 2011, 15, 77-97.	5.4	149
4	DNA Damage by Fascicularin. <i>Journal of the American Chemical Society</i> , 2005, 127, 15004-15005.	13.7	142
5	DNA Cleavage by the Antitumor Agent 3-Amino-1,2,4-benzotriazine 1,4-Dioxide (SR4233): Evidence for Involvement of Hydroxyl Radical. <i>Journal of the American Chemical Society</i> , 1996, 118, 3380-3385.	13.7	130
6	Interstrand Cross-Links Generated by Abasic Sites in Duplex DNA. <i>Journal of the American Chemical Society</i> , 2007, 129, 1852-1853.	13.7	125
7	Redox-activated, hypoxia-selective DNA cleavage by quinoxaline 1,4-di-N-oxide. <i>Bioorganic and Medicinal Chemistry</i> , 2001, 9, 2395-2401.	3.0	120
8	Interstrand DNA-DNA Cross-Link Formation Between Adenine Residues and Abasic Sites in Duplex DNA. <i>Journal of the American Chemical Society</i> , 2014, 136, 3483-3490.	13.7	111
9	Oxidative DNA Cleavage by the Antitumor Antibiotic Leinamycin and Simple 1,2-Dithiolan-3-one 1-Oxides: Evidence for Thiol-Dependent Conversion of Molecular Oxygen to DNA-Cleaving Oxygen Radicals Mediated by Polysulfides. <i>Journal of the American Chemical Society</i> , 1997, 119, 11691-11692.	13.7	91
10	DNA Base Damage by the Antitumor Agent 3-Amino-1,2,4-benzotriazine 1,4-Dioxide (Tirapazamine). <i>Journal of the American Chemical Society</i> , 2003, 125, 11607-11615.	13.7	85
11	A Chemical Model for Redox Regulation of Protein Tyrosine Phosphatase 1B (PTP1B) Activity. <i>Journal of the American Chemical Society</i> , 2005, 127, 10830-10831.	13.7	83
12	On the Formation and Properties of Interstrand DNA-DNA Cross-Links Forged by Reaction of an Abasic Site with the Opposing Guanine Residue of 5'-CAp Sequences in Duplex DNA. <i>Journal of the American Chemical Society</i> , 2013, 135, 1015-1025.	13.7	80
13	Mechanisms of DNA Damage by Leinamycin. <i>Chemical Research in Toxicology</i> , 2000, 13, 953-956.	3.3	78
14	Direct Evidence for Bimodal DNA Damage Induced by Tirapazamine. <i>Chemical Research in Toxicology</i> , 1998, 11, 1254-1257.	3.3	75
15	Kinetics and Mechanism of Protein Tyrosine Phosphatase 1B Inactivation by Acrolein. <i>Chemical Research in Toxicology</i> , 2007, 20, 1315-1320.	3.3	74
16	1,2-Dithiolan-3-one 1-Oxides: A Class of Thiol-Activated DNA-Cleaving Agents That Are Structurally Related to the Natural Product Leinamycin. <i>Biochemistry</i> , 1996, 35, 1768-1774.	2.5	70
17	Generation of reactive oxygen species by a persulfide (BnSSH). <i>Bioorganic and Medicinal Chemistry Letters</i> , 2005, 15, 3921-3924.	2.2	69
18	DNA Binding and Alkylation by the Left Half of Azinomycin B. <i>Biochemistry</i> , 2000, 39, 14968-14975.	2.5	66

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19	DNA Strand Cleavage by the Phenazine Di-N-oxide Natural Product Myxin under Both Aerobic and Anaerobic Conditions. <i>Chemical Research in Toxicology</i> , 2012, 25, 197-206.	3.3	66
20	Reaction of n-Propanethiol with 3H-1,2-Benzodithiol-3-one 1-Oxide and 5,5-Dimethyl-1,2-dithiolan-3-one 1-Oxide: Studies Related to the Reaction of Antitumor Antibiotic Leinamycin with DNA. <i>Journal of Organic Chemistry</i> , 1995, 60, 3964-3966.	3.2	65
21	Reaction of the Hypoxia-Selective Antitumor Agent Tirapazamine with a C1 <sup>-</sup> -Radical in Single-Stranded and Double-Stranded DNA: A The Drug and Its Metabolites Can Serve as Surrogates for Molecular Oxygen in Radical-Mediated DNA Damage Reactions. <i>Biochemistry</i> , 1999, 38, 14248-14255.	2.5	64
22	3-Amino-1,2,4-benzotriazine 4-Oxide: Characterization of a New Metabolite Arising from Bioreductive Processing of the Antitumor Agent 3-Amino-1,2,4-benzotriazine 1,4-Dioxide (Tirapazamine). <i>Journal of Organic Chemistry</i> , 2001, 66, 107-114.	3.2	62
23	Characterization of DNA Damage Induced by a Natural Product Antitumor Antibiotic Leinamycin in Human Cancer Cells. <i>Chemical Research in Toxicology</i> , 2010, 23, 99-107.	3.3	60
24	DNA cleavage by 7-methylbenzopentathiepin: A simple analog of the antitumor antibiotic varacin. <i>Bioorganic and Medicinal Chemistry Letters</i> , 1998, 8, 535-538.	2.2	57
25	The Biological Buffer Bicarbonate/CO <sub>2</sub> Potentiates H <sub>2</sub> O <sub>2</sub> -Mediated Inactivation of Protein Tyrosine Phosphatases. <i>Journal of the American Chemical Society</i> , 2011, 133, 15803-15805.	13.7	57
26	DNA Strand Damage Product Analysis Provides Evidence That the Tumor Cell-Specific Cytotoxin Tirapazamine Produces Hydroxyl Radical and Acts as a Surrogate for O <sub>2</sub> . <i>Journal of the American Chemical Society</i> , 2007, 129, 12870-12877.	13.7	54
27	Initiation of DNA Strand Cleavage by 1,2,4-Benzotriazine 1,4-Dioxide Antitumor Agents: Mechanistic Insight from Studies of 3-Methyl-1,2,4-benzotriazine 1,4-Dioxide. <i>Journal of the American Chemical Society</i> , 2009, 131, 1015-1024.	13.7	54
28	Enzyme-Activated, Hypoxia-Selective DNA Damage by 3-Amino-2-quinoxalinecarbonitrile 1,4-Di-N-oxide. <i>Chemical Research in Toxicology</i> , 2004, 17, 1399-1405.	3.3	53
29	Synthesis and Biological Evaluation of New 2-Arylcarbonyl-3-trifluoromethylquinoxaline 1,4-Di-N-oxide Derivatives and Their Reduced Analogues. <i>Journal of Medicinal Chemistry</i> , 2007, 50, 5485-5492.	6.4	53
30	Evidence for Thiol-Dependent Production of Oxygen Radicals by 4-Methyl-5-pyrazinyl-3H-1,2-dithiole-3-thione (Oltipraz) and 3H-1,2-Dithiole-3-thione: Possible Relevance to the Anticarcinogenic Properties of 1,2-Dithiole-3-thiones. <i>Chemical Research in Toxicology</i> , 1997, 10, 296-301.	3.3	49
31	Thiol-Independent DNA Alkylation by Leinamycin. <i>Journal of the American Chemical Society</i> , 2001, 123, 2060-2061.	13.7	49
32	Chemical Structure and Properties of Interstrand Cross-Links Formed by Reaction of Guanine Residues with Abasic Sites in Duplex DNA. <i>Journal of the American Chemical Society</i> , 2015, 137, 3933-3945.	13.7	49
33	Reaction of Thiols with 7-Methylbenzopentathiepin. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2003, 13, 1349-1352.	2.2	47
34	Thiol-Dependent Recovery of Catalytic Activity from Oxidized Protein Tyrosine Phosphatases. <i>Biochemistry</i> , 2013, 52, 6412-6423.	2.5	47
35	5-(Aminomethyl)-3-aryl-2-oxazolidinones. A novel class of mechanism-based inactivators of monoamine oxidase B. <i>Journal of the American Chemical Society</i> , 1990, 112, 9364-9372.	13.7	45
36	Kinetic Consequences of Replacing the Internucleotide Phosphorus Atoms in DNA with Arsenic. <i>ACS Chemical Biology</i> , 2011, 6, 127-130.	3.4	45

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37	Mimicking Ribosomal Unfolding of RNA Pseudoknot in a Protein Channel. <i>Journal of the American Chemical Society</i> , 2015, 137, 15742-15752.	13.7	45
38	Small Molecules That Mimic the Thiol-Triggered Alkylating Properties Seen in the Natural Product Leinamycin. <i>Journal of the American Chemical Society</i> , 2003, 125, 4996-4997.	13.7	43
39	Generation of DNA-Damaging Reactive Oxygen Species via the Autoxidation of Hydrogen Sulfide under Physiologically Relevant Conditions: Chemistry Relevant to Both the Genotoxic and Cell Signaling Properties of H <sub>2</sub> S. <i>Chemical Research in Toxicology</i> , 2012, 25, 1609-1615.	3.3	43
40	Chemical Properties of the Leinamycin-Guanine Adduct in DNA. <i>Chemical Research in Toxicology</i> , 2004, 17, 942-949.	3.3	40
41	Chemical and structural characterization of interstrand cross-links formed between abasic sites and adenine residues in duplex DNA. <i>Nucleic Acids Research</i> , 2015, 43, 3434-3441.	14.5	39
42	Oxidative DNA base damage by the antitumor agent 3-amino-1,2,4-benzotriazine 1,4-Dioxide (Tirapazamine). <i>Bioorganic and Medicinal Chemistry Letters</i> , 2002, 12, 2325-2329.	2.2	38
43	Sequence Specificity of DNA Alkylation by the Antitumor Natural Product Leinamycin. <i>Chemical Research in Toxicology</i> , 2003, 16, 1539-1546.	3.3	38
44	Protection of a single-cysteine redox switch from oxidative destruction: On the functional role of sulfenyl amide formation in the redox-regulated enzyme PTP1B. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2010, 20, 444-447.	2.2	37
45	Redox Regulation of Protein Tyrosine Phosphatase 1B by Peroxymonophosphate (O <sub>3</sub> POOH). <i>Journal of the American Chemical Society</i> , 2007, 129, 5320-5321.	13.7	36
46	Diethylaminobenzaldehyde Is a Covalent, Irreversible Inactivator of ALDH7A1. <i>ACS Chemical Biology</i> , 2015, 10, 693-697.	3.4	36
47	Total Synthesis and DNA-Cleaving Properties of Thiarubrine C. <i>Journal of Organic Chemistry</i> , 1998, 63, 8644-8645.	3.2	35
48	A mass spectrometry study of tirapazamine and its metabolites: Insights into the mechanism of metabolic transformations and the characterization of reaction intermediates. <i>Journal of the American Society for Mass Spectrometry</i> , 2003, 14, 881-892.	2.8	34
49	A role for the base excision repair enzyme NEIL3 in replication-dependent repair of interstrand DNA cross-links derived from psoralen and abasic sites. <i>DNA Repair</i> , 2017, 52, 1-11.	2.8	34
50	Reactions of 3H-1,2-benzodithiol-3-one 1-oxide with amines and anilines. <i>Tetrahedron Letters</i> , 1996, 37, 5337-5340.	1.4	33
51	Activation of Leinamycin by Thiols: A Theoretical Study. <i>Journal of Organic Chemistry</i> , 2002, 67, 9054-9060.	3.2	33
52	Noncovalent DNA Binding Drives DNA Alkylation by Leinamycin: Evidence That the 5-(Thiazol-4-yl)-penta-2,4-dienone Moiety of the Natural Product Serves as an Atypical DNA Intercalator. <i>Journal of the American Chemical Society</i> , 2011, 133, 17641-17651.	13.7	31
53	Single Molecule Investigation of Ag <sup>+</sup> Interactions with Single Cytosine-, Methylcytosine- and Hydroxymethylcytosine-Cytosine Mismatches in a Nanopore. <i>Scientific Reports</i> , 2014, 4, 5883.	3.3	31
54	Characterization of Interstrand DNA-DNA Cross-Links Using the $\alpha$ -Hemolysin Protein Nanopore. <i>ACS Nano</i> , 2015, 9, 11812-11819.	14.6	31

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55	Hypoxia-Selective, Enzymatic Conversion of 6-Nitroquinoline into a Fluorescent Helicene: Pyrido[3,2- <i>f</i> ]quinolino[6,5- <i>c</i> ]cinnoline 3-Oxide. <i>Journal of Organic Chemistry</i> , 2012, 77, 3531-3537.	3.2	29
56	Interstrand cross-links arising from strand breaks at true abasic sites in duplex DNA. <i>Nucleic Acids Research</i> , 2017, 45, 6275-6283.	14.5	29
57	Photochemical DNA Cleavage by the Antitumor Agent 3-Amino-1,2,4-benzotriazine 1,4-Dioxide (Tirapazamine, WIN 59075, SR4233). <i>Journal of Organic Chemistry</i> , 1998, 63, 10027-10030.	3.2	27
58	Covalent Modification of DNA by Natural Products. , 1999, , 491-552.		27
59	A Simple, High-Yield Synthesis of DNA Duplexes Containing a Covalent, Thermally Cleavable Interstrand Cross-Link at a Defined Location. <i>Angewandte Chemie - International Edition</i> , 2015, 54, 7666-7669.	13.8	26
60	Nanopore-Facilitated Digital Diagnostics of Cancer Driver Mutation in Tumor Tissue. <i>ACS Sensors</i> , 2017, 2, 975-981.	7.8	26
61	Enzymatic Conversion of 6-Nitroquinoline to the Fluorophore 6-Aminoquinoline Selectively under Hypoxic Conditions. <i>Chemical Research in Toxicology</i> , 2013, 26, 555-563.	3.3	25
62	Redox Regulation of Protein Tyrosine Phosphatases. <i>Methods in Enzymology</i> , 2013, 528, 129-154.	1.0	25
63	Synthesis and noncovalent DNA-binding properties of thiazole derivatives related to leinamycin. <i>Tetrahedron Letters</i> , 2004, 45, 5711-5716.	1.4	24
64	Toward Hypoxia-Selective DNA-Alkylating Agents Built by Grafting Nitrogen Mustards onto the Bioreductively Activated, Hypoxia-Selective DNA-Oxidizing Agent 3-Amino-1,2,4-benzotriazine 1,4-Dioxide (Tirapazamine). <i>Journal of Organic Chemistry</i> , 2014, 79, 7520-7531.	3.2	24
65	A New Cross-Link for an Old Cross-Linking Drug: The Nitrogen Mustard Anticancer Agent Mechlorethamine Generates Cross-Links Derived from Abasic Sites in Addition to the Expected Drug-Bridged Cross-Links. <i>Biochemistry</i> , 2016, 55, 7033-7041.	2.5	24
66	Single Locked Nucleic Acid-Enhanced Nanopore Genetic Discrimination of Pathogenic Serotypes and Cancer Driver Mutations. <i>ACS Nano</i> , 2018, 12, 4194-4205.	14.6	24
67	Oxidative inactivation of protein tyrosine phosphatase 1B by organic hydroperoxides. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2008, 18, 5856-5859.	2.2	23
68	DNA strand cleaving properties and hypoxia-selective cytotoxicity of 7-chloro-2-thienylcarbonyl-3-trifluoromethylquinoxaline 1,4-dioxide. <i>Bioorganic and Medicinal Chemistry</i> , 2010, 18, 3125-3132.	3.0	23
69	Unhooking of an interstrand cross-link at DNA fork structures by the DNA glycosylase NEIL3. <i>DNA Repair</i> , 2020, 86, 102752.	2.8	23
70	Photochemical Electron Transfer Reactions of Tirapazamine. <i>Photochemistry and Photobiology</i> , 2002, 75, 339.	2.5	22
71	On the Reaction Mechanism of Tirapazamine Reduction Chemistry: Unimolecular N-OH Homolysis, Stepwise Dehydration, or Triazene Ring-Opening. <i>Chemical Research in Toxicology</i> , 2012, 25, 634-645.	3.3	22
72	Covalent Allosteric Inactivation of Protein Tyrosine Phosphatase 1B (PTP1B) by an Inhibitor-Electrophile Conjugate. <i>Biochemistry</i> , 2017, 56, 2051-2060.	2.5	22

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73	Formation and Repair of an Interstrand DNA Cross-Link Arising from a Common Endogenous Lesion. <i>Journal of the American Chemical Society</i> , 2021, 143, 15344-15357.	13.7	22
74	Thiol-dependent DNA cleavage by 3 H -1,2-benzodithiol-3-one 1,1-dioxide. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2000, 10, 885-889.	2.2	21
75	Photosensitization of Guanine-Specific DNA Damage by a Cyano-Substituted Quinoxaline Di-N-oxide. <i>Chemical Research in Toxicology</i> , 1999, 12, 1190-1194.	3.3	20
76	Characterization of Interstrand DNA-DNA Cross-Links Derived from Abasic Sites Using Bacteriophage T <sub>29</sub> DNA Polymerase. <i>Biochemistry</i> , 2015, 54, 4259-4266.	2.5	20
77	Unexpected Complexity in the Products Arising from NaOH-, Heat-, Amine-, and Glycosylase-Induced Strand Cleavage at an Abasic Site in DNA. <i>Chemical Research in Toxicology</i> , 2022, 35, 218-232.	3.3	20
78	Model studies for the mechanism of inactivation of monoamine oxidase by 5-(aminomethyl)-3-aryl-2-oxazolidinones. <i>Journal of the American Chemical Society</i> , 1989, 111, 8891-8895.	13.7	19
79	DNA Alkylation by leinamycin can be triggered by cyanide and phosphines. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2001, 11, 1511-1515.	2.2	19
80	Enzyme-Activated Generation of Reactive Oxygen Species from Heterocyclic <i>N</i> -Oxides under Aerobic and Anaerobic Conditions and Its Relevance to Hypoxia-Selective Prodrugs. <i>Chemical Research in Toxicology</i> , 2019, 32, 348-361.	3.3	19
81	A fluorimetric assay for the spontaneous release of an N7-alkylguanine residue from duplex DNA. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2005, 15, 2111-2113.	2.2	18
82	Biologically relevant chemical properties of peroxyphosphate (O <sub>3</sub> POOH). <i>Bioorganic and Medicinal Chemistry Letters</i> , 2009, 19, 218-221.	2.2	18
83	Stabilities and Spin Distributions of Benzannulated Benzyl Radicals. <i>Journal of Chemical Theory and Computation</i> , 2007, 3, 1091-1099.	5.3	17
84	Reactions of 1,3-Diketones with a Dipeptide Isothiazolidin-3-one: Toward Agents That Covalently Capture Oxidized Protein Tyrosine Phosphatase 1B. <i>Journal of Organic Chemistry</i> , 2015, 80, 12015-12026.	3.2	17
85	Sequence-Specific Covalent Capture Coupled with High-Contrast Nanopore Detection of a Disease-Derived Nucleic Acid Sequence. <i>ChemBioChem</i> , 2017, 18, 1383-1386.	2.6	17
86	Formation and repair of unavoidable, endogenous interstrand cross-links in cellular DNA. <i>DNA Repair</i> , 2021, 98, 103029.	2.8	17
87	Synthesis and Structure of Functionalized Derivatives of the Cleft-Shaped Molecule Dithiosalicylide. <i>Journal of Organic Chemistry</i> , 1997, 62, 9361-9364.	3.2	16
88	Noncovalent DNA Binding and the Mechanism of Oxidative DNA Damage by Fecapentaene-12. <i>Chemical Research in Toxicology</i> , 2006, 19, 117-121.	3.3	16
89	The Chemical Reactions of DNA Damage and Degradation. , 0, , 333-378.		16
90	Near-Silence of Isothiocyanate Carbon in <sup>13</sup> C NMR Spectra: A Case Study of Allyl Isothiocyanate. <i>Journal of Organic Chemistry</i> , 2015, 80, 4360-4369.	3.2	16

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91	Replication and repair of a reduced 2 $\hat{1}$ , $\hat{}$ -deoxyguanosine-abasic site interstrand cross-link in human cells. <i>Nucleic Acids Research</i> , 2017, 45, 6486-6493.	14.5	16
92	Inactivation of protein tyrosine phosphatases by dietary isothiocyanates. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2015, 25, 4549-4552.	2.2	15
93	Allylation and Alkylation of Biologically Relevant Nucleophiles by Diallyl Sulfides. <i>Journal of Organic Chemistry</i> , 2017, 82, 776-780.	3.2	15
94	Interstrand DNA Cross-Links Derived from Reaction of a 2-Aminopurine Residue with an Abasic Site. <i>ACS Chemical Biology</i> , 2019, 14, 1481-1489.	3.4	15
95	Inhibition, crystal structures, and in-solution oligomeric structure of aldehyde dehydrogenase 9A1. <i>Archives of Biochemistry and Biophysics</i> , 2020, 691, 108477.	3.0	15
96	Possible chemical mechanisms underlying the antitumor activity of S-deoxyleinamycin. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2008, 18, 3076-3080.	2.2	14
97	Effective molarity in a nucleic acid-controlled reaction. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2016, 26, 2627-2630.	2.2	14
98	An autoinhibitory role for the GRF zinc finger domain of DNA glycosylase NEIL3. <i>Journal of Biological Chemistry</i> , 2020, 295, 15566-15575.	3.4	14
99	Isotopic Labeling Experiments That Elucidate the Mechanism of DNA Strand Cleavage by the Hypoxia-Selective Antitumor Agent 1,2,4-Benzotriazine 1,4-Di- $\langle i \rangle N \langle /i \rangle$ -oxide. <i>Chemical Research in Toxicology</i> , 2014, 27, 111-118.	3.3	13
100	Novel syntheses of dithiosalicylide. <i>Tetrahedron Letters</i> , 1995, 36, 1391-1394.	1.4	12
101	Covalent Adduct Formation between the Antihypertensive Drug Hydralazine and Abasic Sites in Double- and Single-Stranded DNA. <i>Chemical Research in Toxicology</i> , 2014, 27, 2113-2118.	3.3	12
102	Generation of Reactive Oxygen Species Mediated by 1-Hydroxyphenazine, a Virulence Factor of $\langle i \rangle Pseudomonas aeruginosa \langle /i \rangle$ . <i>Chemical Research in Toxicology</i> , 2015, 28, 175-181.	3.3	12
103	Exploiting the Inherent Photophysical Properties of the Major Tirapazamine Metabolite in the Development of Profluorescent Substrates for Enzymes That Catalyze the Bioreductive Activation of Hypoxia-Selective Anticancer Prodrugs. <i>Journal of Organic Chemistry</i> , 2018, 83, 3126-3131.	3.2	12
104	Entering the leinamycin rearrangement via 2-(trimethylsilyl)ethyl sulfoxides. <i>Organic and Biomolecular Chemistry</i> , 2007, 5, 1595.	2.8	11
105	DNA-catalyzed hydrolysis of DNA phosphodiesterases. <i>Nature Chemical Biology</i> , 2009, 5, 710-711.	8.0	11
106	Inactivation of protein tyrosine phosphatases by oltipraz and other cancer chemopreventive 1,2-dithiole-3-thiones. <i>Bioorganic and Medicinal Chemistry</i> , 2010, 18, 5945-5949.	3.0	11
107	Thiol-Activated DNA Damage by $\hat{1}$ -Bromo-2-cyclopentenone. <i>Chemical Research in Toxicology</i> , 2011, 24, 217-228.	3.3	11
108	Synthesis and characterization of a small analogue of the anticancer natural product leinamycin. <i>Bioorganic and Medicinal Chemistry</i> , 2013, 21, 235-241.	3.0	11

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109	Structure of a Stable Interstrand DNA Cross-Link Involving a $\beta$ -N-Glycosyl Linkage Between an $\epsilon$ -dA Amino Group and an Abasic Site. <i>Biochemistry</i> , 2021, 60, 41-52.	2.5	11
110	Electron and Spin-Density Analysis of Tirapazamine Reduction Chemistry. <i>Chemical Research in Toxicology</i> , 2012, 25, 620-633.	3.3	10
111	Covalent Modification of the Flavin in Proline Dehydrogenase by Thiazolidine-2-Carboxylate. <i>ACS Chemical Biology</i> , 2020, 15, 936-944.	3.4	10
112	The macrocycle of leinamycin imparts hydrolytic stability to the thiol-sensing 1,2-dithiolan-3-one 1-oxide unit of the natural product. <i>Bioorganic and Medicinal Chemistry Letters</i> , 2012, 22, 3791-3794.	2.2	9
113	Simple, High-Yield Syntheses of DNA Duplexes Containing Interstrand DNA-DNA Cross-Links Between an $\epsilon$ -Aminocytidine Residue and an Abasic Site. <i>Current Protocols in Nucleic Acid Chemistry</i> , 2016, 65, 5.16.1-5.16.15.	0.5	9
114	Application of Suzuki-Miyaura and Buchwald-Hartwig Cross-coupling Reactions to the Preparation of Substituted 1,2,4-Benzotriazine 1-Oxides Related to the Antitumor Agent Tirapazamine. <i>Journal of Heterocyclic Chemistry</i> , 2017, 54, 155-160.	2.6	9
115	Preparation and Purification of Oligodeoxynucleotide Duplexes Containing a Site-Specific, Reduced, Chemically Stable Covalent Interstrand Cross-Link Between a Guanine Residue and an Abasic Site. <i>Methods in Molecular Biology</i> , 2019, 1973, 163-175.	0.9	9
116	Interstrand Cross-Link Formation Involving Reaction of a Mismatched Cytosine Residue with an Abasic Site in Duplex DNA. <i>Chemical Research in Toxicology</i> , 2021, 34, 1124-1132.	3.3	9
117	Reconsidering the Chemical Nature of Strand Breaks Derived from Abasic Sites in Cellular DNA: Evidence for $\beta$ -Glutathionylation. <i>Journal of the American Chemical Society</i> , 2022, 144, 10471-10482.	13.7	9
118	Abstracts, American Chemical Society Division of Chemical Toxicology, 236th ACS National Meeting, Philadelphia, PA, August 17-21, 2008. <i>Chemical Research in Toxicology</i> , 2008, 21, 2433-2453.	3.3	8
119	DNA cleavage induced by antitumor antibiotic leinamycin and its biological consequences. <i>Bioorganic and Medicinal Chemistry</i> , 2012, 20, 4413-4421.	3.0	8
120	FaPy lesions and DNA mutations. <i>Nature Chemical Biology</i> , 2013, 9, 412-414.	8.0	8
121	Products Generated by Amine-Catalyzed Strand Cleavage at Apurinic/Apyrimidinic Sites in DNA: New Insights from a Biomimetic Nucleoside Model System. <i>Chemical Research in Toxicology</i> , 2022, 35, 203-217.	3.3	8
122	Importance of the C-Terminus of Aldehyde Dehydrogenase 7A1 for Oligomerization and Catalytic Activity. <i>Biochemistry</i> , 2017, 56, 5910-5919.	2.5	7
123	Structural and biochemical consequences of pyridoxine-dependent epilepsy mutations that target the aldehyde binding site of aldehyde dehydrogenase ALDH 7A1. <i>FEBS Journal</i> , 2020, 287, 173-189.	4.7	7
124	Two (E,E)- and (Z,E)-thiazol-5-ylpenta-2,4-dienones. <i>Acta Crystallographica Section C: Crystal Structure Communications</i> , 2002, 58, o447-o449.	0.4	6
125	Sulfone-stabilized carbanions for the reversible covalent capture of a posttranslationally-generated cysteine oxoform found in protein tyrosine phosphatase 1B (PTP1B). <i>Bioorganic and Medicinal Chemistry</i> , 2016, 24, 2631-2640.	3.0	6
126	Structural analysis of pathogenic mutations targeting Glu427 of ALDH7A1, the hot spot residue of pyridoxine-dependent epilepsy. <i>Journal of Inherited Metabolic Disease</i> , 2020, 43, 635-644.	3.6	6



#	ARTICLE	IF	CITATIONS
127	Title is missing!. Journal of Chemical Crystallography, 2001, 31, 387-391.	1.1	5
128	Getting under wraps: alkylating DNA in the nucleosome. Nature Chemical Biology, 2006, 2, 64-64.	8.0	5
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132	Crystal structure of a nucleoside model for the interstrand cross-link formed by the reaction of 2â€²-deoxyguanosine and an abasic site in duplex DNA. Acta Crystallographica Section E: Crystallographic Communications, 2016, 72, 624-627.	0.5	5
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138	Generation and Single-Molecule Characterization of a Sequence-Selective Covalent Cross-Link Mediated by Mechlorethamine at a Câ€™C Mismatch in Duplex DNA for Discrimination of a Disease-Relevant Single Nucleotide Polymorphism. Bioconjugate Chemistry, 2018, 29, 3810-3816.	3.6	3
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140	Crystal structures of 3-methyl-1,2,4-benzotriazine 1-oxide and 2-oxide. Journal of Chemical Crystallography, 2006, 36, 557-561.	1.1	2
141	Abstracts, American Chemical Society Division of Chemical Toxicology, 234th ACS National Meeting, Boston, MA, August 19â€™23, 2007. Chemical Research in Toxicology, 2007, 20, 1989-1919.	3.3	2
142	Crystal structure of methyl ( <i>S</i> )-2-[( <i>R</i> )-4-[( <i>tert</i> -butoxycarbonyl)amino]-3-oxo-1,2-thiazolidin-2-yl]-3-methylbutanoate: a chemical model for oxidized protein tyrosine phosphatase 1B (PTP1B). Acta Crystallographica Section E: Crystallographic Communications, 2015, 71, 741-743.	0.5	2
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144	Synthesis of DNA Duplexes Containing Site-Specific Interstrand Cross-Links via Sequential Reductive Amination Reactions Involving Diamine Linkers and Abasic Sites on Complementary Oligodeoxynucleotides. Chemical Research in Toxicology, 2021, 34, 2384-2391.	3.3	2

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146	Crystal structure of N-(quinolin-6-yl)hydroxylamine. <i>Acta Crystallographica Section E: Structure Reports Online</i> , 2014, 70, 322-324.	0.2	1
147	DNA double whammy. <i>Nature Chemistry</i> , 2014, 6, 464-465.	13.6	0
148	Crystal structure of 5-{4-[(2-{2-[2-(2-ammonioethoxy)ethoxy]ethoxy}ethyl)carbamoyl]-4-methoxy-[1,1'-biphenyl]-3-yl]-3-oxo-1,2,5-thiadiazolidin-2-ylidene}-1,1-dioxide: a potential inhibitor of the enzyme protein tyrosine phosphatase 1B (PTP1B). <i>Acta Crystallographica Section E: Crystallographic Communications</i> , 2015, 71, 336-338.	0.5	0