Claudiu T Supuran

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/9222011/publications.pdf Version: 2024-02-01

		336	1385
1,806	100,386	137	222
papers	citations	h-index	g-index
1855	1855	1855	31548
all docs	docs citations	times ranked	citing authors

#	Article	IF	CITATIONS
1	Carbonic anhydrases: novel therapeutic applications for inhibitors and activators. Nature Reviews Drug Discovery, 2008, 7, 168-181.	46.4	2,702
2	Natural products in drug discovery: advances and opportunities. Nature Reviews Drug Discovery, 2021, 20, 200-216.	46.4	1,990
3	Interfering with pH regulation in tumours as a therapeutic strategy. Nature Reviews Drug Discovery, 2011, 10, 767-777.	46.4	1,340
4	Carbonic anhydrase inhibitors. Medicinal Research Reviews, 2003, 23, 146-189.	10.5	1,126
5	Multiple Binding Modes of Inhibitors to Carbonic Anhydrases: How to Design Specific Drugs Targeting 15 Different Isoforms?. Chemical Reviews, 2012, 112, 4421-4468.	47.7	1,056
6	Carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry, 1999, 7, 2397-2406.	3.0	808
7	Structure and function of carbonic anhydrases. Biochemical Journal, 2016, 473, 2023-2032.	3.7	688
8	Targeting Tumor Hypoxia: Suppression of Breast Tumor Growth and Metastasis by Novel Carbonic Anhydrase IX Inhibitors. Cancer Research, 2011, 71, 3364-3376.	0.9	662
9	Anticancer and Antiviral Sulfonamides. Current Medicinal Chemistry, 2003, 10, 925-953.	2.4	646
10	Hypoxia activates the capacity of tumorâ€associated carbonic anhydrase IX to acidify extracellular pH. FEBS Letters, 2004, 577, 439-445.	2.8	620
11	Review Article. Journal of Enzyme Inhibition and Medicinal Chemistry, 2004, 19, 199-229.	5.2	595
12	How many carbonic anhydrase inhibition mechanisms exist?. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 345-360.	5.2	588
13	Carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 3467-3474.	2.2	579
14	Structure-based drug discovery of carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 759-772.	5.2	554
15	Carbonic anhydrases as targets for medicinal chemistry. Bioorganic and Medicinal Chemistry, 2007, 15, 4336-4350.	3.0	521
16	Carbonic anhydrase inhibitors and their therapeutic potential. Expert Opinion on Therapeutic Patents, 2000, 10, 575-600.	5.0	485
17	Carbonic Anhydrases An Overview. Current Pharmaceutical Design, 2008, 14, 603-614.	1.9	476
18	Non-Zinc Mediated Inhibition of Carbonic Anhydrases: Coumarins Are a New Class of Suicide Inhibitors. Journal of the American Chemical Society, 2009, 131, 3057-3062.	13.7	457

#	Article	IF	CITATIONS
19	Crystal structure of the catalytic domain of the tumor-associated human carbonic anhydrase IX. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 16233-16238.	7.1	451
20	Ureido-Substituted Benzenesulfonamides Potently Inhibit Carbonic Anhydrase IX and Show Antimetastatic Activity in a Model of Breast Cancer Metastasis. Journal of Medicinal Chemistry, 2011, 54, 1896-1902.	6.4	443
21	Unexpected Nanomolar Inhibition of Carbonic Anhydrase by COX-2-Selective Celecoxib:Â New Pharmacological Opportunities Due to Related Binding Site Recognition. Journal of Medicinal Chemistry, 2004, 47, 550-557.	6.4	426
22	Protease inhibitors of the sulfonamide type: Anticancer, antiinflammatory, and antiviral agents. Medicinal Research Reviews, 2003, 23, 535-558.	10.5	385
23	Recent Developments in Targeting Carbonic Anhydrase IX for Cancer Therapeutics. Oncotarget, 2012, 3, 84-97.	1.8	365
24	Deciphering the Mechanism of Carbonic Anhydrase Inhibition with Coumarins and Thiocoumarins. Journal of Medicinal Chemistry, 2010, 53, 335-344.	6.4	363
25	Targeting tumor-associated carbonic anhydrase IX in cancer therapy. Trends in Pharmacological Sciences, 2006, 27, 566-573.	8.7	362
26	Advances in structure-based drug discovery of carbonic anhydrase inhibitors. Expert Opinion on Drug Discovery, 2017, 12, 61-88.	5.0	356
27	An overview of the alpha-, beta- and gamma-carbonic anhydrases from <i>Bacteria</i> : can bacterial carbonic anhydrases shed new light on evolution of bacteria?. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 325-332.	5.2	328
28	Adverse Cardiovascular Effects of the Coxibs. Journal of Medicinal Chemistry, 2005, 48, 2251-2257.	6.4	304
29	Discovery of a new family of carbonic anhydrases in the malaria pathogen Plasmodium falciparum —The Îcarbonic anhydrases. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 4389-4396.	2.2	297
30	Carbonic Anhydrase Inhibitors. Synthesis of Water-Soluble, Topically Effective, Intraocular Pressure-Lowering Aromatic/Heterocyclic Sulfonamides Containing Cationic or Anionic Moieties:  Is the Tail More Important than the Ring?. Journal of Medicinal Chemistry, 1999, 42, 2641-2650.	6.4	278
31	Carbonic anhydrases: from biomedical applications of the inhibitors and activators to biotechnological use for CO2 capture. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 229-230.	5.2	278
32	Antiglaucoma carbonic anhydrase inhibitors: a patent review. Expert Opinion on Therapeutic Patents, 2013, 23, 705-716.	5.0	273
33	Carbonic Anhydrase Activators:  X-ray Crystallographic and Spectroscopic Investigations for the Interaction of Isozymes I and II with Histamine,. Biochemistry, 1997, 36, 10384-10392.	2.5	269
34	Carbonic anhydrase inhibitors and activators for novel therapeutic applications. Future Medicinal Chemistry, 2011, 3, 1165-1180.	2.3	260
35	Biochemical Characterization of CA IX, One of the Most Active Carbonic Anhydrase Isozymes. Journal of Biological Chemistry, 2008, 283, 27799-27809.	3.4	258
36	The Warburg Effect and the Hallmarks of Cancer. Anti-Cancer Agents in Medicinal Chemistry, 2017, 17, 164-170.	1.7	258

#	Article	IF	CITATIONS
37	Sulfa and trimethoprim-like drugs – antimetabolites acting as carbonic anhydrase, dihydropteroate synthase and dihydrofolate reductase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 379-387.	5.2	255
38	Carbonic anhydrase inhibitors: Sulfonamides as antitumor agents?. Bioorganic and Medicinal Chemistry, 2001, 9, 703-714.	3.0	252
39	Diuretics with carbonic anhydrase inhibitory action: a patent and literature review (2005 – 2013). Expert Opinion on Therapeutic Patents, 2013, 23, 681-691.	5.0	252
40	Carbonic anhydrase inhibitors: E7070, a sulfonamide anticancer agent, potently inhibits cytosolic isozymes I and II, and transmembrane, tumor-associated isozyme IX. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 217-223.	2.2	251
41	The Role of Carbonic Anhydrase 9 in Regulating Extracellular and Intracellular pH in Three-dimensional Tumor Cell Growths. Journal of Biological Chemistry, 2009, 284, 20299-20310.	3.4	249
42	Antiobesity carbonic anhydrase inhibitors: a literature and patent review . Expert Opinion on Therapeutic Patents, 2013, 23, 725-735.	5.0	246
43	Sulfonamides and Sulfonylated Derivatives as Anticancer Agents. Current Cancer Drug Targets, 2002, 2, 55-75.	1.6	243
44	Applications of carbonic anhydrase inhibitors and activators in therapy. Expert Opinion on Therapeutic Patents, 2002, 12, 217-242.	5.0	243
45	A Smallâ€Molecule Drug Conjugate for the Treatment of Carbonic Anhydrase IX Expressing Tumors. Angewandte Chemie - International Edition, 2014, 53, 4231-4235.	13.8	242
46	Bacterial Carbonic Anhydrases as Drug Targets: Toward Novel Antibiotics?. Frontiers in Pharmacology, 2011, 2, 34.	3.5	229
47	Exploiting the hydrophobic and hydrophilic binding sites for designing carbonic anhydrase inhibitors. Expert Opinion on Drug Discovery, 2013, 8, 793-810.	5.0	229
48	Glycosyl Coumarin Carbonic Anhydrase IX and XII Inhibitors Strongly Attenuate the Growth of Primary Breast Tumors. Journal of Medicinal Chemistry, 2011, 54, 8271-8277.	6.4	228
49	Anticancer carbonic anhydrase inhibitors: a patent review (2008 – 2013). Expert Opinion on Therapeutic Patents, 2013, 23, 737-749.	5.0	226
50	Carbonic Anhydrase and Matrix Metalloproteinase Inhibitors:  Sulfonylated Amino Acid Hydroxamates with MMP Inhibitory Properties Act as Efficient Inhibitors of CA Isozymes I, II, and IV, and N-Hydroxysulfonamides Inhibit Both These Zinc Enzymes. Journal of Medicinal Chemistry, 2000, 43, 3677-3687.	6.4	224
51	Highly Active Antiretroviral Therapy: Current State of the Art, New Agents and Their Pharmacological Interactions Useful for Improving Therapeutic Outcome. Current Pharmaceutical Design, 2005, 11, 1805-1843.	1.9	222
52	Carbonic anhydrase inhibitors: SAR and X-ray crystallographic study for the interaction of sugar sulfamates/sulfamides with isozymes I, II and IV. Bioorganic and Medicinal Chemistry Letters, 2003, 13, 841-845.	2.2	221
53	Carbonic Anhydrase in the Scleractinian Coral Stylophora pistillata. Journal of Biological Chemistry, 2008, 283, 25475-25484.	3.4	221
54	Diuretics: From Classical Carbonic Anhydrase Inhibitors to Novel Applications of the Sulfonamides. Current Pharmaceutical Design, 2008, 14, 641-648.	1.9	219

#	Article	IF	CITATIONS
55	Carbonic anhydrase inhibitors. Inhibition of the transmembrane isozyme XII with sulfonamides—a new target for the design of antitumor and antiglaucoma drugs?. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 963-969.	2.2	212
56	Dithiocarbamates Strongly Inhibit Carbonic Anhydrases and Show Antiglaucoma Action in Vivo. Journal of Medicinal Chemistry, 2012, 55, 1721-1730.	6.4	211
57	Characterization of CA XIII, a Novel Member of the Carbonic Anhydrase Isozyme Family. Journal of Biological Chemistry, 2004, 279, 2719-2727.	3.4	210
58	Carbonic anhydrase IX: A new druggable target for the design of antitumor agents. Medicinal Research Reviews, 2008, 28, 445-463.	10.5	210
59	Carbonic Anhydrase Inhibitors as Anticonvulsant Agents. Current Topics in Medicinal Chemistry, 2007, 7, 855-864.	2.1	209
60	Carbonic anhydrase inhibitors. Inhibition of human erythrocyte isozymes I and II with a series of antioxidant phenols. Bioorganic and Medicinal Chemistry, 2009, 17, 3207-3211.	3.0	207
61	Inhibition of carbonic anhydrase IX targets primary tumors, metastases, and cancer stem cells: Three for the price of one. Medicinal Research Reviews, 2018, 38, 1799-1836.	10.5	207
62	Carbonic Anhydrase Inhibitors. Design of Fluorescent Sulfonamides as Probes of Tumor-Associated Carbonic Anhydrase IX That Inhibit Isozyme IX-Mediated Acidification of Hypoxic Tumorsâ€. Journal of Medicinal Chemistry, 2005, 48, 4834-4841.	6.4	205
63	Polyamines Inhibit Carbonic Anhydrases by Anchoring to the Zinc-Coordinated Water Molecule. Journal of Medicinal Chemistry, 2010, 53, 5511-5522.	6.4	205
64	Carbonic anhydrase inhibitors. Inhibition of mammalian isoforms l–XIV with a series of natural product polyphenols and phenolic acids. Bioorganic and Medicinal Chemistry, 2010, 18, 2159-2164.	3.0	204
65	Anti-infective carbonic anhydrase inhibitors: a patent and literature review. Expert Opinion on Therapeutic Patents, 2013, 23, 693-704.	5.0	203
66	Sulfonamides: a patent review (2008 – 2012). Expert Opinion on Therapeutic Patents, 2012, 22, 747-758.	5.0	201
67	Carbonic Anhydrase Inhibitors:  X-ray and Molecular Modeling Study for the Interaction of a Fluorescent Antitumor Sulfonamide with Isozyme II and IX. Journal of the American Chemical Society, 2006, 128, 8329-8335.	13.7	200
68	Selective hydrophobic pocket binding observed within the carbonic anhydrase II active site accommodate different 4-substituted-ureido-benzenesulfonamides and correlate to inhibitor potency. Chemical Communications, 2010, 46, 8371.	4.1	200
69	Sulfocoumarins (1,2-Benzoxathiine-2,2-dioxides): A Class of Potent and Isoform-Selective Inhibitors of Tumor-Associated Carbonic Anhydrases. Journal of Medicinal Chemistry, 2013, 56, 293-300.	6.4	199
70	Carbonic Anhydrase Inhibition and the Management of Hypoxic Tumors. Metabolites, 2017, 7, 48.	2.9	197
71	Carbonic Anhydrase Inhibitors. Current Medicinal Chemistry Immunology, Endocrine & Metabolic Agents, 2001, 1, 61-97.	0.2	195
72	Carbonic Anhydrases as Drug Targets - An Overview. Current Topics in Medicinal Chemistry, 2007, 7, 825-833.	2.1	195

#	Article	IF	CITATIONS
73	Carbonic anhydrase inhibitors as emerging agents for the treatment and imaging of hypoxic tumors. Expert Opinion on Investigational Drugs, 2018, 27, 963-970.	4.1	195
74	Structure and Inhibition of the CO2-Sensing Carbonic Anhydrase Can2 from the Pathogenic Fungus Cryptococcus neoformans. Journal of Molecular Biology, 2009, 385, 1207-1220.	4.2	193
75	Sulfamates and their therapeutic potential. Medicinal Research Reviews, 2005, 25, 186-228.	10.5	191
76	Carbonic anhydrase inhibitors: inhibition of the tumor-associated isozyme IX with aromatic and heterocyclic sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2003, 13, 1005-1009.	2.2	189
77	The α and β Classes Carbonic Anhydrases from Helicobacter pylori as Novel Drug Targets. Current Pharmaceutical Design, 2008, 14, 622-630.	1.9	188
78	Synthesis and Carbonic Anhydrase Isoenzymes I, II, IX, and XII Inhibitory Effects of Dimethoxybromophenol Derivatives Incorporating Cyclopropane Moieties. Journal of Medicinal Chemistry, 2015, 58, 640-650.	6.4	187
79	Carbonic anhydrase inhibitors: Interactions of phenols with the 12 catalytically active mammalian isoforms (CA l–XIV). Bioorganic and Medicinal Chemistry Letters, 2008, 18, 1583-1587.	2.2	186
80	(In)organic anions as carbonic anhydrase inhibitors. Journal of Inorganic Biochemistry, 2012, 111, 117-129.	3.5	186
81	Tumor-associated Carbonic Anhydrase 9 Spatially Coordinates Intracellular pH in Three-dimensional Multicellular Growths. Journal of Biological Chemistry, 2008, 283, 20473-20483.	3.4	185
82	Imaging of CA IX with fluorescent labelled sulfonamides distinguishes hypoxic and (re)-oxygenated cells in a xenograft tumour model. Radiotherapy and Oncology, 2009, 92, 423-428.	0.6	185
83	Carbonic Anhydrase Inhibitors. The Mitochondrial Isozyme VB as a New Target for Sulfonamide and Sulfamate Inhibitors. Journal of Medicinal Chemistry, 2005, 48, 7860-7866.	6.4	179
84	Carbonic Anhydrase Inhibitors:Â Inhibition of Isozymes I, II, and IX with Triazole-LinkedO-Glycosides of Benzene Sulfonamides. Journal of Medicinal Chemistry, 2007, 50, 1651-1657.	6.4	179
85	Carbonic anhydrase inhibitors. Zonisamide is an effective inhibitor of the cytosolic isozyme II and mitochondrial isozyme V: solution and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 2315-2320.	2.2	176
86	Carbonic anhydrases in anthozoan corals—A review. Bioorganic and Medicinal Chemistry, 2013, 21, 1437-1450.	3.0	174
87	Bacterial, fungal and protozoan carbonic anhydrases as drug targets. Expert Opinion on Therapeutic Targets, 2015, 19, 1689-1704.	3.4	174
88	Therapeutic potential of sulfamides as enzyme inhibitors. Medicinal Research Reviews, 2006, 26, 767-792.	10.5	173
89	Rosmarinic acid inhibits some metabolic enzymes including glutathione <i>S</i> -transferase, lactoperoxidase, acetylcholinesterase, butyrylcholinesterase and carbonic anhydrase isoenzymes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1698-1702.	5.2	173
90	Sulfonamides and their isosters as carbonic anhydrase inhibitors. Future Medicinal Chemistry, 2014, 6, 1149-1165.	2.3	172

#	Article	IF	CITATIONS
91	<i>In Vitro</i> Inhibition of Human Carbonic Anhydrase I and II Isozymes with Natural Phenolic Compounds. Chemical Biology and Drug Design, 2011, 77, 494-499.	3.2	170
92	In vitro inhibition of α-carbonic anhydrase isozymes by some phenolic compounds. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 4259-4262.	2.2	170
93	A Novel Class of Carbonic Anhydrase Inhibitors:  Glycoconjugate Benzene Sulfonamides Prepared by "Click-Tailing― Journal of Medicinal Chemistry, 2006, 49, 6539-6548.	6.4	168
94	Saccharin Inhibits Carbonic Anhydrases: Possible Explanation for its Unpleasant Metallic Aftertaste. Angewandte Chemie - International Edition, 2007, 46, 7697-7699.	13.8	168
95	Taking advantage of tumor cell adaptations to hypoxia for developing new tumor markers and treatment strategies. Journal of Enzyme Inhibition and Medicinal Chemistry, 2009, 24, 1-39.	5.2	167
96	New strategies for targeting the hypoxic tumour microenvironment in breast cancer. Cancer Treatment Reviews, 2013, 39, 171-179.	7.7	167
97	Indisulam: an anticancer sulfonamide in clinical development. Expert Opinion on Investigational Drugs, 2003, 12, 283-287.	4.1	166
98	Carbonic anhydrase IX: Biochemical and crystallographic characterization of a novel antitumor target. Biochimica Et Biophysica Acta - Proteins and Proteomics, 2010, 1804, 404-409.	2.3	166
99	Carbonic anhydrase inhibitors as emerging drugs for the treatment of obesity. Expert Opinion on Emerging Drugs, 2008, 13, 383-392.	2.4	165
100	An Overview of the Bacterial Carbonic Anhydrases. Metabolites, 2017, 7, 56.	2.9	165
101	Carbonic Anhydrases and Metabolism. Metabolites, 2018, 8, 25.	2.9	164
102	In vitro inhibition of salicylic acid derivatives on human cytosolic carbonic anhydrase isozymes I and II. Bioorganic and Medicinal Chemistry, 2008, 16, 9101-9105.	3.0	160
103	Carbonic anhydrase inhibitors as antitumor/antimetastatic agents: a patent review (2008–2018). Expert Opinion on Therapeutic Patents, 2018, 28, 729-740.	5.0	160
104	Modulation of carbonic anhydrase activity and its applications in therapy. Expert Opinion on Therapeutic Patents, 2004, 14, 667-702.	5.0	159
105	Carbonic anhydrase inhibitors and activators and their use in therapy. Expert Opinion on Therapeutic Patents, 2006, 16, 1627-1664.	5.0	158
106	Carbonic Anhydrase Inhibitors:Â Stacking with Phe131 Determines Active Site Binding Region of Inhibitors As Exemplified by the X-ray Crystal Structure of a Membrane-Impermeant Antitumor Sulfonamide Complexed with Isozyme II. Journal of Medicinal Chemistry, 2005, 48, 5721-5727.	6.4	157
107	Imaging the hypoxia surrogate marker CA IX requires expression and catalytic activity for binding fluorescent sulfonamide inhibitors. Radiotherapy and Oncology, 2007, 83, 367-373.	0.6	157
108	Carbonic anhydrase inhibitors: The β-carbonic anhydrase from Helicobacter pylori is a new target for sulfonamide and sulfamate inhibitors. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 3585-3594.	2.2	157

#	Article	IF	CITATIONS
109	Dithiocarbamates: a new class of carbonic anhydrase inhibitors. Crystallographic and kinetic investigations. Chemical Communications, 2012, 48, 1868.	4.1	157
110	Specific inhibition of carbonic anhydrase IX activity enhances the in vivo therapeutic effect of tumor irradiation. Radiotherapy and Oncology, 2011, 99, 424-431.	0.6	156
111	Nonaromatic Sulfonamide Group as an Ideal Anchor for Potent Human Carbonic Anhydrase Inhibitors: Role of Hydrogen-Bonding Networks in Ligand Binding and Drug Design. Journal of Medicinal Chemistry, 2002, 45, 3583-3587.	6.4	154
112	Carbonic Anhydrase Inhibitors:  DNA Cloning and Inhibition Studies of the α-Carbonic Anhydrase from Helicobacter pylori, A New Target for Developing Sulfonamide and Sulfamate Gastric Drugs. Journal of Medicinal Chemistry, 2006, 49, 2117-2126.	6.4	154
113	Progress in the development of human carbonic anhydraseÂinhibitors and their pharmacological applications: Where are we today?. Medicinal Research Reviews, 2020, 40, 2485-2565.	10.5	154
114	Carbonic Anhydrase Inhibitors:Â Synthesis of Water-Soluble, Aminoacyl/Dipeptidyl Sulfonamides Possessing Long-Lasting Intraocular Pressure-Lowering Properties via the Topical Route1. Journal of Medicinal Chemistry, 1999, 42, 3690-3700.	6.4	153
115	Regulation of pH by Carbonic Anhydrase 9 Mediates Survival of Pancreatic Cancer Cells With Activated KRAS in Response to Hypoxia. Gastroenterology, 2019, 157, 823-837.	1.3	153
116	Carbonic anhydrase inhibitors - Part 49: Synthesis of substituted ureido and thioureido derivatives of aromatic/heterocyclic sulfonamides with increased affinities for isozyme I. European Journal of Medicinal Chemistry, 1998, 33, 83-93.	5.5	152
117	7,8-Disubstituted- but not 6,7-disubstituted coumarins selectively inhibit the transmembrane, tumor-associated carbonic anhydrase isoforms IX and XII over the cytosolic ones I and II in the low nanomolar/subnanomolar range. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 7255-7258.	2.2	152
118	Carbonic anhydrase inhibitors. Antioxidant polyphenols effectively inhibit mammalian isoforms I–XV. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 5050-5053.	2.2	151
119	Carbonic anhydrase inhibitors: The first selective, membrane-impermeant inhibitors targeting the tumor-associated isozyme IX. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 869-873.	2.2	150
120	Are Carbonic Anhydrase Inhibitors Suitable for Obtaining Antiobesity Drugs ?. Current Pharmaceutical Design, 2008, 14, 655-660.	1.9	150
121	A new approach to antiglaucoma drugs: carbonic anhydrase inhibitors with or without NO donating moieties. Mechanism of action and preliminary pharmacology. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 138-147.	5.2	150
122	Carbonic Anhydrase Inhibitors. Design of Selective, Membrane-Impermeant Inhibitors Targeting the Human Tumor-Associated Isozyme IX. Journal of Medicinal Chemistry, 2004, 47, 2337-2347.	6.4	149
123	Antimetastatic Effect of Sulfamate Carbonic Anhydrase IX Inhibitors in Breast Carcinoma Xenografts. Journal of Medicinal Chemistry, 2012, 55, 5591-5600.	6.4	149
124	Carbonic Anhydrase Inhibitors:Â Synthesis of Membrane-Impermeant Low Molecular Weight Sulfonamides Possessing in Vivo Selectivity for the Membrane-Bound versus Cytosolic Isozymes1. Journal of Medicinal Chemistry, 2000, 43, 292-300.	6.4	147
125	Bacterial protease inhibitors. Medicinal Research Reviews, 2002, 22, 329-372.	10.5	147
126	Carbonic anhydrase inhibitors: X-ray crystallographic structure of the adduct of human isozyme II with EMATE, a dual inhibitor of carbonic anhydrases and steroid sulfatase. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 231-234.	2.2	147

#	Article	IF	CITATIONS
127	Metal binding and antibacterial activity of ciprofloxacin complexes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2005, 20, 303-307.	5.2	147
128	Carbonic Anhydrase Inhibitors:  Clash with Ala65 as a Means for Designing Inhibitors with Low Affinity for the Ubiquitous Isozyme II, Exemplified by the Crystal Structure of the Topiramate Sulfamide Analogue. Journal of Medicinal Chemistry, 2006, 49, 7024-7031.	6.4	147
129	Zinc Complexes of Benzothiazole-derived Schiff Bases with Antibacterial Activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2003, 18, 259-263.	5.2	146
130	The Îclass carbonic anhydrases as drug targets for antimalarial agents. Expert Opinion on Therapeutic Targets, 2015, 19, 551-563.	3.4	146
131	Carbonic anhydrase inhibitors. Inhibition of the human cytosolic isozyme VII with aromatic and heterocyclic sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 971-976.	2.2	145
132	Carbonic Anhydrase Inhibitors:Â Water-Soluble 4-Sulfamoylphenylthioureas as Topical Intraocular Pressure-Lowering Agents with Long-Lasting Effects. Journal of Medicinal Chemistry, 2000, 43, 4884-4892.	6.4	143
133	Carbonic Anhydrase Inhibitors. Inhibition of Mitochondrial Isozyme V with Aromatic and Heterocyclic Sulfonamides. Journal of Medicinal Chemistry, 2004, 47, 1272-1279.	6.4	143
134	N-Acylsulfonamides strongly inhibit human carbonic anhydrase isoenzymes I and II. Bioorganic and Medicinal Chemistry, 2015, 23, 2598-2605.	3.0	142
135	The effect of caffeic acid phenethyl ester (CAPE) on metabolic enzymes including acetylcholinesterase, butyrylcholinesterase, glutathione S-transferase, lactoperoxidase, and carbonic anhydrase isoenzymes I, II, IX, and XII. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1095-1101.	5.2	142
136	Carbonic Anhydrase Inhibitors:  Anticonvulsant Sulfonamides Incorporating Valproyl and Other Lipophilic Moieties. Journal of Medicinal Chemistry, 2002, 45, 312-320.	6.4	141
137	Carbonic Anhydrase Inhibitors. Inhibition of Tumor-Associated Isozyme IX by Halogenosulfanilamide and Halogenophenylaminobenzolamide Derivativesâ€. Journal of Medicinal Chemistry, 2003, 46, 2187-2196.	6.4	141
138	Efficient Expression and Crystallization System of Cancer-Associated Carbonic Anhydrase Isoform IX. Journal of Medicinal Chemistry, 2015, 58, 9004-9009.	6.4	141
139	A Phase 1 Study of SLC-0111, a Novel Inhibitor of Carbonic Anhydrase IX, in Patients With Advanced Solid Tumors. American Journal of Clinical Oncology: Cancer Clinical Trials, 2020, 43, 484-490.	1.3	141
140	Benzothiazole derivatives as anticancer agents. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 265-279.	5.2	140
141	Carbonic Anhydrase Inhibitors:  Perfluoroalkyl/Aryl-Substituted Derivatives of Aromatic/Heterocyclic Sulfonamides as Topical Intraocular Pressure-Lowering Agents with Prolonged Duration of Action. Journal of Medicinal Chemistry, 2000, 43, 4542-4551.	6.4	139
142	Carbonic anhydrase inhibitors in the treatment and prophylaxis of obesity. Expert Opinion on Therapeutic Patents, 2003, 13, 1545-1550.	5.0	139
143	Carbonic Anhydrase Inhibitors. A General Approach for the Preparation of Water-Soluble Sulfonamides Incorporating Polyaminoâ [°] Polycarboxylate Tails and of Their Metal Complexes Possessing Long-Lasting, Topical Intraocular Pressure-Lowering Properties. Journal of Medicinal Chemistry, 2002, 45, 1466-1476.	6.4	138
144	Carbonic Anhydrase Inhibitors. Inhibition of Cytosolic Isozymes I and II and Transmembrane, Tumor-Associated Isozyme IX with Sulfamates Including EMATE Also Acting as Steroid Sulfatase Inhibitors. Journal of Medicinal Chemistry, 2003, 46, 2197-2204.	6.4	138

#	Article	IF	CITATIONS
145	Designing of Novel Carbonic Anhydrase Inhibitors and Activators. Current Medicinal Chemistry Cardiovascular and Hematological Agents, 2004, 2, 49-68.	1.7	138
146	Carbonic anhydrase inhibitors: Inhibition of the transmembrane isozyme XIV with sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 3828-3833.	2.2	138
147	Carbonic anhydrase inhibitors and their potential in a range of therapeutic areas. Expert Opinion on Therapeutic Patents, 2018, 28, 709-712.	5.0	138
148	Carbonic anhydrase inhibitors: Novel sulfonamides incorporating 1,3,5-triazine moieties as inhibitors of the cytosolic and tumour-associated carbonic anhydrase isozymes I, II and IX. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 3102-3108.	2.2	137
149	Discovery of potent carbonic anhydrase and acetylcholine esterase inhibitors: Novel sulfamoylcarbamates and sulfamides derived from acetophenones. Bioorganic and Medicinal Chemistry, 2015, 23, 3592-3602.	3.0	137
150	Carbonic anhydrase IX from cancer-associated fibroblasts drives epithelial-mesenchymal transition in prostate carcinoma cells. Cell Cycle, 2013, 12, 1791-1801.	2.6	136
151	Carbonic anhydrase inhibitors — Part 29 1: Interaction of isozymes I, II and IV with benzolamide-like derivatives. European Journal of Medicinal Chemistry, 1998, 33, 739-751.	5.5	135
152	Coumarins incorporating hydroxy- and chloro-moieties selectively inhibit the transmembrane, tumor-associated carbonic anhydrase isoforms IX and XII over the cytosolic ones I and II. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 4511-4514.	2.2	135
153	Carbonic anhydrase IX inhibitors in cancer therapy: an update. Future Medicinal Chemistry, 2015, 7, 1407-1414.	2.3	135
154	Carbonic Anhydrase Inhibitors: Inhibition of Human Erythrocyte Isozymes I and II with a Series of Phenolic Acids. Chemical Biology and Drug Design, 2010, 75, 515-520.	3.2	134
155	<i>In-vitro</i> antibacterial, antifungal and cytotoxic properties of sulfonamide—derived Schiff's bases and their metal complexes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2005, 20, 183-188.	5.2	133
156	Inhibitors of HIV-1 Protease: Current State of the Art 10 Years After their Introduction. From Antiretroviral Drugs to Antifungal, Antibacterial and Antitumor Agents Based on Aspartic Protease Inhibitors. Current Medicinal Chemistry, 2007, 14, 2734-2748.	2.4	132
157	Carbonic anhydrase inhibitors — Part 52. Metal complexes of heterocyclic sulfonamides: A new class of strong topical intraocular pressure-lowering agents in rabbits. European Journal of Medicinal Chemistry, 1998, 33, 247-254.	5.5	131
158	Carbonic Anhydrase Activators. Activation of Isozymes I, II, IV, VA, VII, and XIV withL- andD-Histidine and Crystallographic Analysis of Their Adducts with Isoform II: Engineering Proton-Transfer Processes within the Active Site of an Enzyme. Chemistry - A European Journal, 2006, 12, 7057-7066.	3.3	131
159	Biomimetic CO ₂ capture using a highly thermostable bacterial α-carbonic anhydrase immobilized on a polyurethane foam. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 146-150.	5.2	131
160	Acetylcholinesterase and carbonic anhydrase inhibitory properties of novel urea and sulfamide derivatives incorporating dopaminergic 2-aminotetralin scaffolds. Bioorganic and Medicinal Chemistry, 2016, 24, 2318-2329.	3.0	131
161	COX-2 Selective Inhibitors, Carbonic Anhydrase Inhibition and Anticancer Properties of Sulfonamides Belonging to This Class of Pharmacological Agents. Mini-Reviews in Medicinal Chemistry, 2004, 4, 625-632.	2.4	130
162	Root Effect Hemoglobin May Have Evolved to Enhance General Tissue Oxygen Delivery. Science, 2013, 340, 1327-1329.	12.6	130

#	Article	IF	CITATIONS
163	Anticonvulsant Sulfonamides/Sulfamates/Sulfamides with Carbonic Anhydrase Inhibitory Activity: Drug Design and Mechanism of Action. Current Pharmaceutical Design, 2008, 14, 661-671.	1.9	129
164	Selection of Carbonic Anhydrase IX Inhibitors from One Million DNA-Encoded Compounds. ACS Chemical Biology, 2011, 6, 336-344.	3.4	129
165	Carbonic Anhydrase Activators. Activation of Isoforms I, II, IV, VA, VII, and XIV with I- and d-Phenylalanine and Crystallographic Analysis of Their Adducts with Isozyme II:  Stereospecific Recognition within the Active Site of an Enzyme and Its Consequences for the Drug Design. Journal of Medicinal Chemistrv. 2006. 49. 3019-3027.	6.4	128
166	Acetazolamide for the treatment of idiopathic intracranial hypertension. Expert Review of Neurotherapeutics, 2015, 15, 851-856.	2.8	128
167	A magnificent enzyme superfamily: carbonic anhydrases, their purification and characterization. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 689-694.	5.2	128
168	Carbonic anhydrase activators. Future Medicinal Chemistry, 2018, 10, 561-573.	2.3	127
169	In-vitro antibacterial, antifungal and cytotoxic activities of some coumarins and their metal complexes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2005, 20, 333-340.	5.2	126
170	Inhibition of the Archaeal β-Class (Cab) and γ-Class (Cam) Carbonic Anhydrases. Current Topics in Medicinal Chemistry, 2007, 7, 901-908.	2.1	126
171	A class of sulfonamide carbonic anhydrase inhibitors with neuropathic pain modulating effects. Bioorganic and Medicinal Chemistry, 2015, 23, 1828-1840.	3.0	126
172	Dithiocarbamates strongly inhibit the β-class carbonic anhydrases from <i>Mycobacterium tuberculosis</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 407-411.	5.2	125
173	Carbonic anhydrase inhibitors: an editorial. Expert Opinion on Therapeutic Patents, 2013, 23, 677-679.	5.0	125
174	Synthesis of 4,5-disubstituted-2-thioxo-1,2,3,4-tetrahydropyrimidines and investigation of their acetylcholinesterase, butyrylcholinesterase, carbonic anhydrase I/II inhibitory and antioxidant activities. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1-9.	5.2	125
175	Synthesis of diaryl ethers with acetylcholinesterase, butyrylcholinesterase and carbonic anhydrase inhibitory actions. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 79-85.	5.2	125
176	Inhibitory effects of isatin Mannich bases on carbonic anhydrases, acetylcholinesterase, and butyrylcholinesterase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1498-1501.	5.2	125
177	Unsymmetrical 1,1′-disubstituted Ferrocenes: Synthesis of Co(ii), Cu(ii), Ni(ii) and Zn(ii) Chelates of Ferrocenyl -1-thiadiazolo-1′-tetrazole, -1-thiadiazolo-1′-triazole and -1-tetrazolo-1′-triazole with Antimicrobial Properties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2002, 17, 261-266.	5.2	124
178	Carbonic anhydrase inhibition and the management of neuropathic pain. Expert Review of Neurotherapeutics, 2016, 16, 961-968.	2.8	124
179	The Coumarin-Binding Site in Carbonic Anhydrase Accommodates Structurally Diverse Inhibitors: The Antiepileptic Lacosamide As an Example and Lead Molecule for Novel Classes of Carbonic Anhydrase Inhibitors. Journal of Medicinal Chemistry, 2010, 53, 850-854.	6.4	123
180	Advances in the structural annotation of human carbonic anhydrases and impact on future drug discovery. Expert Opinion on Drug Discovery, 2019, 14, 1175-1197.	5.0	123

#	Article	IF	CITATIONS
181	Carbonic anhydrase inhibitors – Part 57: Quantum chemical QSAR of a group of 1,3,4-thiadiazole- and 1,3,4-thiadiazoline disulfonamides with carbonic anhydrase inhibitory properties. European Journal of Medicinal Chemistry, 1999, 34, 41-50.	5.5	122
182	Novel therapies for glaucoma: a patent review 2007 – 2011. Expert Opinion on Therapeutic Patents, 2012, 22, 79-88.	5.0	121
183	An α-carbonic anhydrase from the thermophilic bacterium Sulphurihydrogenibium azorense is the fastest enzyme known for the CO2 hydration reaction. Bioorganic and Medicinal Chemistry, 2013, 21, 1465-1469.	3.0	121
184	Carbonic anhydrase inhibitors: guaiacol and catechol derivatives effectively inhibit certain human carbonic anhydrase isoenzymes (hCA I, II, IX and XII). Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 586-591.	5.2	121
185	Carbonic anhydrase inhibitors: Inhibition of mammalian isoforms l–XIV with a series of substituted phenols including paracetamol and salicylic acid. Bioorganic and Medicinal Chemistry, 2008, 16, 7424-7428.	3.0	120
186	Synthesis and carbonic anhydrase inhibitory properties of sulfamides structurally related to dopamine. Bioorganic and Medicinal Chemistry, 2013, 21, 2925-2931.	3.0	120
187	Coxibs and Cardiovascular Side-Effects: From Light to Shadow. Current Pharmaceutical Design, 2006, 12, 971-975.	1.9	118
188	Carbonic Anhydrase Inhibition/Activation: Trip of a Scientist Around the World in the Search of Novel Chemotypes and Drug Targets. Current Pharmaceutical Design, 2010, 16, 3233-3245.	1.9	117
189	Phosphorylation of Carbonic Anhydrase IX Controls Its Ability to Mediate Extracellular Acidification in Hypoxic Tumors. Cancer Research, 2011, 71, 7558-7567.	0.9	117
190	Emerging role of carbonic anhydrase inhibitors. Clinical Science, 2021, 135, 1233-1249.	4.3	117
191	Investigation of inhibitory properties of some hydrazone compounds on hCA I, hCA II and AChE enzymes. Bioorganic Chemistry, 2019, 86, 316-321.	4.1	117
192	Carbonic anhydrase and acetylcholinesterase inhibitory effects of carbamates and sulfamoylcarbamates. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 316-320.	5.2	116
193	Carbonic Anhydrase Inhibitors Targeting Metabolism and Tumor Microenvironment. Metabolites, 2020, 10, 412.	2.9	116
194	Carbonic Anhydrase Activators. 3: Structure-Activity Correlations for a Series of Isozyme I1 Activators. Journal of Pharmaceutical Sciences, 1994, 83, 768-773.	3.3	115
195	Carbonic anhydrase inhibitors. Inhibition of cytosolic/tumor-associated carbonic anhydrase isozymes I, II, IX, and XII with Schiff's bases incorporating chromone and aromatic sulfonamide moieties, and their zinc complexes. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 3096-3101.	2.2	115
196	Novel sulfamides as potential carbonic anhydrase isoenzymes inhibitors. Bioorganic and Medicinal Chemistry, 2013, 21, 1379-1385.	3.0	115
197	Glaucoma and the Applications of Carbonic Anhydrase Inhibitors. Sub-Cellular Biochemistry, 2014, 75, 349-359.	2.4	114
198	Targeting Hypoxic Tumor Cell Viability with Carbohydrate-Based Carbonic Anhydrase IX and XII Inhibitors. Journal of Medicinal Chemistry, 2011, 54, 6905-6918.	6.4	113

#	Article	IF	CITATIONS
199	Synthesis and bioactivity studies on new 4-(3-(4-Substitutedphenyl)-3a,4-dihydro-3 <i>H</i> -indeno[1,2-c]pyrazol-2-yl) benzenesulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1619-1624.	5.2	113
200	Carbonic anhydrase inhibitors: synthesis of sulfonamides incorporating dtpa tails and of their zinc complexes with powerful topical antiglaucoma properties. Bioorganic and Medicinal Chemistry Letters, 2001, 11, 575-582.	2.2	112
201	Biochemical properties of a novel and highly thermostable bacterial α-carbonic anhydrase from <i>Sulfurihydrogenibium yellowstonense YO3AOP1</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 892-897.	5.2	111
202	Out of the active site binding pocket for carbonic anhydrase inhibitors. Chemical Communications, 2015, 51, 302-305.	4.1	111
203	Sildenafil is a strong activator of mammalian carbonic anhydrase isoforms l–XIV. Bioorganic and Medicinal Chemistry, 2009, 17, 5791-5795.	3.0	110
204	Carbonic anhydrase inhibitory properties of novel sulfonamide derivatives of aminoindanes and aminotetralins. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 35-42.	5.2	110
205	Oxidation of cyanobenzocycloheptatrienes: Synthesis, photooxygenation reaction and carbonic anhydrase isoenzymes inhibition properties of some new benzotropone derivatives. Bioorganic and Medicinal Chemistry, 2014, 22, 3537-3543.	3.0	110
206	Novel 4/3-((4-oxo-5-(2-oxoindolin-3-ylidene)thiazolidin-2-ylidene)amino) benzenesulfonamides: Synthesis, carbonic anhydrase inhibitory activity, anticancer activity and molecular modelling studies. European Journal of Medicinal Chemistry, 2017, 139, 250-262.	5.5	110
207	[(Cpâ€R)M(CO) ₃] (M=Re or ^{99m} Tc) Arylsulfonamide, Arylsulfamide, and Arylsulfamate Conjugates for Selective Targeting of Human Carbonic Anhydrase IX. Angewandte Chemie - International Edition, 2012, 51, 3354-3357.	13.8	109
208	Novel coumarins and 2-thioxo-coumarins as inhibitors of the tumor-associated carbonic anhydrases IX and XII. Bioorganic and Medicinal Chemistry, 2012, 20, 2266-2273.	3.0	109
209	The zinc coordination pattern in the Îcarbonic anhydrase from Plasmodium falciparum is different from all other carbonic anhydrase genetic families. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 1385-1389.	2.2	108
210	Synthesis and bioactivities of pyrazoline benzensulfonamides as carbonic anhydrase and acetylcholinesterase inhibitors with low cytotoxicity. Bioorganic Chemistry, 2019, 84, 511-517.	4.1	108
211	Bacterial proteases: current therapeutic use and future prospects for the development of new antibiotics. Expert Opinion on Therapeutic Patents, 2001, 11, 221-259.	5.0	107
212	Carbonic Anhydrase Inhibitors. Cloning, Characterization, and Inhibition Studies of a New β-Carbonic Anhydrase from <i>Mycobacterium tuberculosis</i> . Journal of Medicinal Chemistry, 2009, 52, 3116-3120.	6.4	107
213	Investigations of the esterase, phosphatase, and sulfatase activities of the cytosolic mammalian carbonic anhydrase isoforms I, II, and XIII with 4-nitrophenyl esters as substrates. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 2267-2271.	2.2	104
214	Therapeutic applications of glycosidic carbonic anhydrase inhibitors. Medicinal Research Reviews, 2009, 29, 419-435.	10.5	104
215	Cloning, Characterization, and Inhibition Studies of a β-Carbonic Anhydrase from <i>Brucella suis</i> . Journal of Medicinal Chemistry, 2010, 53, 2277-2285.	6.4	104
216	Combining the tail and the ring approaches for obtaining potent and isoform-selective carbonic anhydrase inhibitors: Solution and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry, 2014, 22, 334-340.	3.0	104

#	Article	IF	CITATIONS
217	Design and Synthesis of Novel Nonsteroidal Anti-Inflammatory Drugs and Carbonic Anhydrase Inhibitors Hybrids (NSAIDs–CAIs) for the Treatment of Rheumatoid Arthritis. Journal of Medicinal Chemistry, 2017, 60, 1159-1170.	6.4	104
218	Effects of low molecular weight plasma inhibitors of rainbow trout (Oncorhynchus mykiss) on human erythrocyte carbonic anhydrase-II isozyme activity in vitro and rat erythrocytes in vivo. Journal of Enzyme Inhibition and Medicinal Chemistry, 2005, 20, 35-39.	5.2	103
219	DNA Cloning, Characterization, and Inhibition Studies of an α-Carbonic Anhydrase from the Pathogenic Bacterium Vibrio cholerae. Journal of Medicinal Chemistry, 2012, 55, 10742-10748.	6.4	103
220	Carbon- versus sulphur-based zinc binding groups for carbonic anhydrase inhibitors?. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 485-495.	5.2	103
221	Carbonic Anhydrase Inhibitor Coated Gold Nanoparticles Selectively Inhibit the Tumor-Associated Isoform IX over the Cytosolic Isozymes I and II. Journal of the American Chemical Society, 2008, 130, 16130-16131.	13.7	102
222	Carbonic anhydrase inhibitors: <i>in vitro</i> inhibition of α isoforms (hCA I, hCA II, bCA III, hCA IV) by flavonoids. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 283-288.	5.2	102
223	The Development of Topically Acting Carbonic Anhydrase Inhibitors as Antiglaucoma Agents. Current Pharmaceutical Design, 2008, 14, 649-654.	1.9	101
224	Carbonic anhydrase inhibitors. Characterization and inhibition studies of the most active β-carbonic anhydrase from Mycobacterium tuberculosis, Rv3588c. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 6649-6654.	2.2	101
225	Synthesis of some tetrahydropyrimidine-5-carboxylates, determination of their metal chelating effects and inhibition profiles against acetylcholinesterase, butyrylcholinesterase and carbonic anhydrase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1531-1539.	5.2	101
226	Carbonic Anhydrase Inhibitors:Â Hypoxia-Activatable Sulfonamides Incorporating Disulfide Bonds that Target the Tumor-Associated Isoform IXâ€. Journal of Medicinal Chemistry, 2006, 49, 5544-5551.	6.4	100
227	Carbonic anhydrase inhibitors: Cloning, characterization, and inhibition studies of the cytosolic isozyme III with sulfonamides. Bioorganic and Medicinal Chemistry, 2007, 15, 7229-7236.	3.0	100
228	Structural and inhibition insights into carbonic anhydrase CDCA1 from the marine diatom Thalassiosira weissflogii. Biochimie, 2012, 94, 1232-1241.	2.6	100
229	X-ray structure of the first `extremo-α-carbonic anhydrase', a dimeric enzyme from the thermophilic bacterium <i>Sulfurihydrogenibium yellowstonense</i> YO3AOP1. Acta Crystallographica Section D: Biological Crystallography, 2013, 69, 1150-1159.	2.5	100
230	Carbonic anhydrase activators: X-ray crystal structure of the adduct of human isozyme II with l-histidine as a platform for the design of stronger activators. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 5136-5141.	2.2	99
231	New anticancer drug candidates sulfonamides as selective hCA IX or hCA XII inhibitors. Bioorganic Chemistry, 2018, 77, 411-419.	4.1	99
232	Carbonic anhydrase inhibitors: synthesis and inhibition of cytosolic/tumor-associated carbonic anhydrase isozymes I, II, and IX with sulfonamides incorporating 1,2,4-triazine moieties. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 5427-5433.	2.2	98
233	2-Substituted Estradiol Bis-sulfamates, Multitargeted Antitumor Agents:Â Synthesis, In Vitro SAR, Protein Crystallography, and In Vivo Activityâ€. Journal of Medicinal Chemistry, 2006, 49, 7683-7696.	6.4	98
234	Carbonic anhydrase inhibitors: Inhibition of the β-class enzymes from the fungal pathogens Candida albicans and Cryptococcus neoformans with simple anions. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 5066-5070.	2.2	98

#	Article	IF	CITATIONS
235	Structural study of interaction between brinzolamide and dorzolamide inhibition of human carbonic anhydrases. Bioorganic and Medicinal Chemistry, 2013, 21, 7210-7215.	3.0	98
236	Non-Classical Inhibition of Carbonic Anhydrase. International Journal of Molecular Sciences, 2016, 17, 1150.	4.1	98
237	Crystal structure of human carbonic anhydrase XIII and its complex with the inhibitor acetazolamide. Proteins: Structure, Function and Bioinformatics, 2009, 74, 164-175.	2.6	97
238	Kinetic and docking studies of phenol-based inhibitors of carbonic anhydrase isoforms I, II, IX and XII evidence a new binding mode within the enzyme active site. Bioorganic and Medicinal Chemistry, 2011, 19, 1381-1389.	3.0	97
239	Dithiocarbamates are strong inhibitors of the beta-class fungal carbonic anhydrases from Cryptococcus neoformans, Candida albicans and Candida glabrata. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 859-862.	2.2	97
240	Effect of sulfonamides as carbonic anhydrase VA and VB inhibitors on mitochondrial metabolic energy conversion. Bioorganic and Medicinal Chemistry, 2013, 21, 1544-1548.	3.0	97
241	Natural product coumarins that inhibit human carbonic anhydrases. Bioorganic and Medicinal Chemistry, 2013, 21, 1539-1543.	3.0	97
242	Applications of carbonic anhydrases inhibitors in renal and central nervous system diseases. Expert Opinion on Therapeutic Patents, 2018, 28, 713-721.	5.0	97
243	Selective Inhibition of Carbonic Anhydrase IX Decreases Cell Proliferation and Induces Ceramide-Mediated Apoptosis in Human Cancer Cells. Journal of Pharmacology and Experimental Therapeutics, 2010, 334, 710-719.	2.5	96
244	Carbonic Anhydrase Inhibitors Drug Design. Sub-Cellular Biochemistry, 2014, 75, 291-323.	2.4	96
245	The impact of hydroquinone on acetylcholine esterase and certain human carbonic anhydrase isoenzymes (hCA I, II, IX, and XII). Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 941-946.	5.2	96
246	Antiobesity Carbonic Anhydrase Inhibitors. Current Topics in Medicinal Chemistry, 2007, 7, 879-884.	2.1	95
247	Natural Product-Based Phenols as Novel Probes for Mycobacterial and Fungal Carbonic Anhydrases. Journal of Medicinal Chemistry, 2011, 54, 1682-1692.	6.4	95
248	Molecular Cloning, Characterization, and Inhibition Studies of the Rv1284 β-Carbonic Anhydrase from <i>Mycobacterium tuberculosis</i> with Sulfonamides and a Sulfamate. Journal of Medicinal Chemistry, 2009, 52, 2226-2232.	6.4	94
249	Crystal structure and kinetic studies of a tetrameric type II β-carbonic anhydrase from the pathogenic bacterium <i>Vibrio cholerae</i> . Acta Crystallographica Section D: Biological Crystallography, 2015, 71, 2449-2456.	2.5	94
250	Exploring the multiple binding modes of inhibitors to carbonic anhydrases for novel drug discovery. Expert Opinion on Drug Discovery, 2020, 15, 671-686.	5.0	94
251	Transition Metal Ion Complexes of Schiff-bases. Synthesis, Characterization and Antibacterial Properties. Metal-Based Drugs, 2001, 8, 137-143.	3.8	93
252	Carbonic anhydrase inhibitors: Valdecoxib binds to a different active site region of the human isoform II as compared to the structurally related cyclooxygenase II †selective' inhibitor celecoxib. Bioorganic and Medicinal Chemistry Letters, 2006, 16, 437-442.	2.2	93

#	Article	IF	CITATIONS
253	Carbonic anhydrase activators: l-Adrenaline plugs the active site entrance of isozyme II, activating better isoforms I, IV, VA, VII, and XIV. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 628-635.	2.2	93
254	Cyclic Secondary Sulfonamides: Unusually Good Inhibitors of Cancer-Related Carbonic Anhydrase Enzymes. Journal of Medicinal Chemistry, 2014, 57, 3522-3531.	6.4	93
255	Targeting tumour hypoxia to prevent cancer metastasis. From biology, biosensing and technology to drug development: the METOXIA consortium. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 689-721.	5.2	93
256	Benzenesulfonamides Incorporating Flexible Triazole Moieties Are Highly Effective Carbonic Anhydrase Inhibitors: Synthesis and Kinetic, Crystallographic, Computational, and Intraocular Pressure Lowering Investigations. Journal of Medicinal Chemistry, 2016, 59, 10692-10704.	6.4	93
257	Synthesis, carbonic anhydrase I and II inhibition studies of the 1,3,5-trisubstituted-pyrazolines. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 189-192.	5.2	93
258	Carbonic anhydrases. Bioorganic and Medicinal Chemistry, 2013, 21, 1377-1378.	3.0	92
259	Isatin-pyrazole benzenesulfonamide hybrids potently inhibit tumor-associated carbonic anhydrase isoforms IX and XII. European Journal of Medicinal Chemistry, 2015, 103, 583-593.	5.5	92
260	The synthesis of some β-lactams and investigation of their metal-chelating activity, carbonic anhydrase and acetylcholinesterase inhibition profiles. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 79-88.	5.2	92
261	Xanthates and Trithiocarbonates Strongly Inhibit Carbonic Anhydrases and Show Antiglaucoma Effects in Vivo. Journal of Medicinal Chemistry, 2013, 56, 4691-4700.	6.4	91
262	Acetylcholinesterase and carbonic anhydrase isoenzymes I and II inhibition profiles of taxifolin. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1-7.	5.2	91
263	Regulation of HIF1α under Hypoxia by APE1/Ref-1 Impacts CA9 Expression: Dual Targeting in Patient-Derived 3D Pancreatic Cancer Models. Molecular Cancer Therapeutics, 2016, 15, 2722-2732.	4.1	91
264	Carbonic anhydrase inhibitors: aromatic and heterocyclic sulfonamides incorporating adamantyl moieties with strong anticonvulsant activity. Bioorganic and Medicinal Chemistry, 2004, 12, 2717-2726.	3.0	90
265	Sulfonamides incorporating 1,3,5-triazine moieties selectively and potently inhibit carbonic anhydrase transmembrane isoforms IX, XII and XIV over cytosolic isoforms I and II: Solution and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry, 2011, 19, 3105-3119.	3.0	90
266	Metronidazole-coumarin conjugates and 3-cyano-7-hydroxy-coumarin act as isoform-selective carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 397-401.	5.2	90
267	Biochemical properties of a new α -carbonic anhydrase from the human pathogenic bacterium, <i>Vibrio cholerae</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 23-27.	5.2	90
268	The human carbonic anhydrase isoenzymes I and II (hCA I and II) inhibition effects of trimethoxyindane derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 152-157.	5.2	90
269	The effects of some bromophenols on human carbonic anhydrase isoenzymes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 603-607.	5.2	90
270	Cloning, Characterization, and Sulfonamide and Thiol Inhibition Studies of an α-Carbonic Anhydrase fromTrypanosoma cruzi, the Causative Agent of Chagas Disease. Journal of Medicinal Chemistry, 2013, 56, 1761-1771.	6.4	89

#	Article	IF	CITATIONS
271	Carbonic Anhydrase Inhibitors. DNA Cloning, Characterization, and Inhibition Studies of the Human Secretory Isoform VI, a New Target for Sulfonamide and Sulfamate Inhibitors. Journal of Medicinal Chemistry, 2007, 50, 381-388.	6.4	88
272	Carbonic anhydrase inhibitors. Sulfonamide diuretics revisited—old leads for new applications?. Organic and Biomolecular Chemistry, 2008, 6, 2499.	2.8	88
273	CO ₂ permeability of cell membranes is regulated by membrane cholesterol and protein gas channels. FASEB Journal, 2012, 26, 5182-5191.	0.5	88
274	Metallocene-Based Inhibitors of Cancer-Associated Carbonic Anhydrase Enzymes IX and XII. Journal of Medicinal Chemistry, 2012, 55, 5506-5517.	6.4	88
275	Inhibition of the alpha- and beta-carbonic anhydrases from the gastric pathogen <i>Helycobacter pylori</i> with anions. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 388-391.	5.2	88
276	Carbonic anhydrase inhibition for the management of cerebral ischemia: <i>in vivo</i> evaluation of sulfonamide and coumarin inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 894-899.	5.2	88
277	Biomedical applications of prokaryotic carbonic anhydrases. Expert Opinion on Therapeutic Patents, 2018, 28, 745-754.	5.0	88
278	Cloning, Characterization, and Inhibition Studies of a β-Carbonic Anhydrase from Leishmania donovani chagasi, the Protozoan Parasite Responsible for Leishmaniasis. Journal of Medicinal Chemistry, 2013, 56, 7372-7381.	6.4	87
279	6-Substituted Sulfocoumarins Are Selective Carbonic Anhdydrase IX and XII Inhibitors with Significant Cytotoxicity against Colorectal Cancer Cells. Journal of Medicinal Chemistry, 2015, 58, 3975-3983.	6.4	87
280	Carbonic anhydrase inhibitors: Inhibition of the β-class enzyme from the yeast Saccharomyces cerevisiae with sulfonamides and sulfamates. Bioorganic and Medicinal Chemistry, 2009, 17, 1158-1163.	3.0	86
281	Drug interaction considerations in the therapeutic use of carbonic anhydrase inhibitors. Expert Opinion on Drug Metabolism and Toxicology, 2016, 12, 423-431.	3.3	86
282	Benzoxaborole compounds for therapeutic uses: a patent review (2010- 2018). Expert Opinion on Therapeutic Patents, 2018, 28, 493-504.	5.0	86
283	The functional and physical relationship between the DRA bicarbonate transporter and carbonic anhydrase II. American Journal of Physiology - Cell Physiology, 2002, 283, C1522-C1529.	4.6	85
284	The β-Carbonic Anhydrases from Mycobacterium tuberculosis as Drug Targets. Current Pharmaceutical Design, 2010, 16, 3300-3309.	1.9	85
285	Novel coumarins and benzocoumarins acting as isoform-selective inhibitors against the tumor-associated carbonic anhydrase IX. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 292-296.	5.2	84
286	Nanoscale Ion Emitters in Native Mass Spectrometry for Measuring Ligand–Protein Binding Affinities. ACS Central Science, 2019, 5, 308-318.	11.3	84
287	Carbonic anhydrase inhibitors. Inhibition of the prokariotic beta and gamma-class enzymes from Archaea with sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 6001-6006.	2.2	83
288	A New Coral Carbonic Anhydrase in Stylophora pistillata. Marine Biotechnology, 2011, 13, 992-1002.	2.4	83

#	Article	IF	CITATIONS
289	Carbonic Anhydrase Inhibitors with Dual-Tail Moieties To Match the Hydrophobic and Hydrophilic Halves of the Carbonic Anhydrase Active Site. Journal of Medicinal Chemistry, 2015, 58, 1494-1501.	6.4	83
290	Indole derivatives as multifunctional drugs: Synthesis and evaluation of antioxidant, photoprotective and antiproliferative activity of indole hydrazones. Bioorganic Chemistry, 2019, 85, 568-576.	4.1	83
291	Discovery of Low Nanomolar and Subnanomolar Inhibitors of the Mycobacterial β-Carbonic Anhydrases Rv1284 and Rv3273. Journal of Medicinal Chemistry, 2009, 52, 4063-4067.	6.4	82
292	Synthesis and biological evaluation of a 99mTc-labelled sulfonamide conjugate for in vivo visualization of carbonic anhydrase IX expression in tumor hypoxia. Nuclear Medicine and Biology, 2010, 37, 557-564.	0.6	82
293	Overexpression of the transmembrane carbonic anhydrase isoforms IX and XII in the inflamed synovium. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 60-63.	5.2	82
294	Carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry Letters, 2003, 13, 837-840.	2.2	81
295	Carbonic anhydrase inhibitors. Inhibition of Plasmodium falciparum carbonic anhydrase with aromatic sulfonamides: towards antimalarials with a novel mechanism of action?. Bioorganic and Medicinal Chemistry, 2005, 13, 483-489.	3.0	81
296	Carbonic anhydrase activators: The first X-ray crystallographic study of an adduct of isoform I. Bioorganic and Medicinal Chemistry Letters, 2006, 16, 5152-5156.	2.2	81
297	Carbonic Anhydrase Activation and the Drug Design. Current Pharmaceutical Design, 2008, 14, 708-715.	1.9	81
298	Crystal structure of the C183S/C217S mutant of human CA VII in complex with acetazolamide. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 5023-5026.	2.2	81
299	Emerging trends in enzyme inhibition by multivalent nanoconstructs. Organic and Biomolecular Chemistry, 2015, 13, 9894-9906.	2.8	81
300	Protonography, a new technique for the analysis of carbonic anhydrase activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 277-282.	5.2	81
301	Enhancement of the tail hydrophobic interactions within the carbonic anhydrase IX active site via structural extension: Design and synthesis of novel N-substituted isatins-SLC-0111 hybrids as carbonic anhydrase inhibitors and antitumor agents. European Journal of Medicinal Chemistry, 2019, 162, 147-160.	5.5	81
302	Reconsidering anion inhibitors in the general context of drug design studies of modulators of activity of the classical enzyme carbonic anhydrase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 561-580.	5.2	81
303	Targeting carbonic anhydrase IX by nitroimidazole based sulfamides enhances the therapeutic effect of tumor irradiation: A new concept of dual targeting drugs. Radiotherapy and Oncology, 2013, 108, 523-528.	0.6	80
304	Carbonic anhydrase inhibitors. Part 61. Quantum chemical QSAR of a group of benzenedisulfonamides. European Journal of Medicinal Chemistry, 1999, 34, 463-474.	5.5	79
305	Carbonic Anhydrase Inhibitors:  Inhibition of Transmembrane, Tumor-Associated Isozyme IX, and Cytosolic Isozymes I and II with Aliphatic Sulfamates. Journal of Medicinal Chemistry, 2003, 46, 5471-5477.	6.4	79
306	The proteoglycan region of the tumor-associated carbonic anhydrase isoform IX acts as anintrinsic buffer optimizing CO2 hydration at acidic pH values characteristic of solid tumors. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 5825-5828.	2.2	79

#	Article	IF	CITATIONS
307	Generation and characterization of the first inhibitory antibody targeting tumour-associated carbonic anhydrase XII. Cancer Immunology, Immunotherapy, 2011, 60, 649-658.	4.2	79
308	A new β-carbonic anhydrase from Brucella suis, its cloning, characterization, and inhibition with sulfonamides and sulfamates, leading to impaired pathogen growth. Bioorganic and Medicinal Chemistry, 2011, 19, 1172-1178.	3.0	79
309	Inhibition of carbonic anhydrase IX as a novel anticancer mechanism. World Journal of Clinical Oncology, 2012, 3, 98.	2.3	79
310	Secondary and tertiary sulfonamides: a patent review (2008 – 2012). Expert Opinion on Therapeutic Patents, 2013, 23, 203-213.	5.0	79
311	Synthesis and carbonic anhydrase inhibition of a series of SLC-0111 analogs. Bioorganic and Medicinal Chemistry, 2017, 25, 2569-2576.	3.0	79
312	Carbonic anhydrase inhibitors: the first QSAR study on inhibition of tumor-associated isoenzyme IX with aromatic and heterocyclic sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 3283-3290.	2.2	78
313	New Zinc Binding Motifs in the Design of Selective Carbonic Anhydrase Inhibitors. Mini-Reviews in Medicinal Chemistry, 2006, 6, 921-936.	2.4	78
314	Design, synthesis, and docking studies of new 1,3,4-thiadiazole-2-thione derivatives with carbonic anhydrase inhibitory activity. Bioorganic and Medicinal Chemistry, 2007, 15, 6975-6984.	3.0	78
315	Carbonic anhydrase III: A neglected isozyme is stepping into the limelight. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 231-239.	5.2	78
316	Inhibition of Carbonic Anhydrases with Glycosyltriazole Benzene Sulfonamides. Journal of Medicinal Chemistry, 2008, 51, 1945-1953.	6.4	77
317	Anion inhibition studies of an α-carbonic anhydrase from the thermophilic bacterium Sulfurihydrogenibium yellowstonense YO3AOP1. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 5630-5634.	2.2	77
318	Amido/ureidosubstituted benzenesulfonamides-isatin conjugates as low nanomolar/subnanomolar inhibitors of the tumor-associated carbonic anhydrase isoform XII. European Journal of Medicinal Chemistry, 2016, 110, 259-266.	5.5	77
319	Carbonic anhydrase activation enhances object recognition memory in mice through phosphorylation of the extracellular signal-regulated kinase in the cortex and the hippocampus. Neuropharmacology, 2017, 118, 148-156.	4.1	77
320	Synthesis and biological evaluation of aminomethyl and alkoxymethyl derivatives as carbonic anhydrase, acetylcholinesterase and butyrylcholinesterase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1174-1182.	5.2	77
321	Arylsulfonyl-N,N-diethyl-dithiocarbamates: a novel class of antitumor agents. Bioorganic and Medicinal Chemistry Letters, 2000, 10, 1887-1891.	2.2	76
322	Carbonic anhydrase inhibitors. X-ray crystal studies of the carbonic anhydrase II–trithiocarbonate adduct—An inhibitor mimicking the sulfonamide and urea binding to the enzyme. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 474-478.	2.2	76
323	Inhibition of the β-carbonic anhydrase from Streptococcus pneumoniae by inorganic anions and small molecules: Toward innovative drug design of antiinfectives?. Bioorganic and Medicinal Chemistry, 2011, 19, 243-248.	3.0	76
324	Secondary/tertiary benzenesulfonamides with inhibitory action against the cytosolic human carbonic anhydrase isoforms I and II. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 294-298.	5.2	76

#	Article	IF	CITATIONS
325	Hypoxia-Targeting Carbonic Anhydrase IX Inhibitors by a New Series of Nitroimidazole-Sulfonamides/Sulfamides/Sulfamates. Journal of Medicinal Chemistry, 2013, 56, 8512-8520.	6.4	76
326	Evaluation of carbonic anhydrase IX as a therapeutic target for inhibition of breast cancer invasion and metastasis using a series of <i>in vitro</i> breast cancer models. Oncotarget, 2015, 6, 24856-24870.	1.8	76
327	Carbonic anhydrase IX inhibition affects viability of cancer cells adapted to extracellular acidosis. Journal of Molecular Medicine, 2017, 95, 1341-1353.	3.9	76
328	Inhibition of acetylcholinesterase and butyrylcholinesterase with uracil derivatives: kinetic and computational studies. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 429-437.	5.2	76
329	Bacterial ι-carbonic anhydrase: a new active class of carbonic anhydrase identified in the genome of the Gram-negative bacterium <i>Burkholderia territorii</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1060-1068.	5.2	76
330	Synthesis of Coumarin Derivatives with Cytotoxic, Antibacterial and Antifungal Activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2004, 19, 373-379.	5.2	75
331	Design of Zinc Binding Functions for Carbonic Anhydrase Inhibitors. Current Pharmaceutical Design, 2008, 14, 615-621.	1.9	75
332	Rational drug repositioning guided by an integrated pharmacological network of protein, disease and drug. BMC Systems Biology, 2012, 6, 80.	3.0	75
333	Carbonic anhydrase inhibitors as emerging drugs for the treatment of obesity. Expert Opinion on Emerging Drugs, 2012, 17, 11-15.	2.4	75
334	Thioxocoumarins Show an Alternative Carbonic Anhydrase Inhibition Mechanism Compared to Coumarins. Journal of Medicinal Chemistry, 2016, 59, 462-473.	6.4	75
335	Sulfonamide Inhibitors of Human Carbonic Anhydrases Designed through a Three-Tails Approach: Improving Ligand/Isoform Matching and Selectivity of Action. Journal of Medicinal Chemistry, 2020, 63, 7422-7444.	6.4	75
336	Carbonic anhydrase inhibitors — Part 53. Synthesis of substituted-pyridinium derivatives of aromatic sulfonamides: The first non-polymeric membrane-impermeable inhibitors with selectivity for isozyme IV. European Journal of Medicinal Chemistry, 1998, 33, 577-594.	5.5	74
337	Carbonic Anhydrase Activators:  Design of High Affinity Isozymes I, II, and IV Activators, Incorporating Tri-/Tetrasubstituted-pyridinium-azole Moieties. Journal of Medicinal Chemistry, 2002, 45, 504-510.	6.4	74
338	The sulfamide motif in the design of enzyme inhibitors. Expert Opinion on Therapeutic Patents, 2006, 16, 27-47.	5.0	74
339	The Alpha-Carbonic Anhydrase from the Malaria Parasite and its Inhibition. Current Pharmaceutical Design, 2008, 14, 631-640.	1.9	74
340	In Vivo Imaging and Quantification of Carbonic Anhydrase IX Expression as an Endogenous Biomarker of Tumor Hypoxia. PLoS ONE, 2012, 7, e50860.	2.5	74
341	Recent advances in the discovery of zinc-binding motifs for the development of carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 321-324.	5.2	74
342	The carbonic anhydrase IX inhibitor SLC-0111 sensitises cancer cells to conventional chemotherapy. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 117-123.	5.2	74

#	Article	IF	CITATIONS
343	<p>Experimental Carbonic Anhydrase Inhibitors for the Treatment of Hypoxic Tumors</p> . Journal of Experimental Pharmacology, 2020, Volume 12, 603-617.	3.2	74
344	The first activation study of a bacterial carbonic anhydrase (CA). The thermostable α-CA from Sulfurihydrogenibium yellowstonense YO3AOP1 is highly activated by amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 6324-6327.	2.2	73
345	Dihalogenated sulfanilamides and benzolamides are effective inhibitors of the three β-class carbonic anhydrases from Mycobacterium tuberculosis. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 384-387.	5.2	73
346	Inhibition of the β-class carbonic anhydrases from <i>Mycobacterium tuberculosis</i> with carboxylic acids. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 392-396.	5.2	73
347	Design, synthesis and evaluation of N-substituted saccharin derivatives as selective inhibitors of tumor-associated carbonic anhydrase XII. Bioorganic and Medicinal Chemistry, 2014, 22, 1821-1831.	3.0	73
348	Which Carbonic Anhydrases are Targeted by the Antiepileptic Sulfonamides and Sulfamates?. Chemical Biology and Drug Design, 2009, 74, 317-321.	3.2	72
349	Characterization of the first beta-class carbonic anhydrase from an arthropod (Drosophila) Tj ETQq1 1 0.784314 Biochemistry, 2010, 11, 28.	rgBT /Ove 4.4	rlock 10 Tf 5 72
350	Carbonic anhydrase inhibitors: inhibition of human and bovine isoenzymes by benzenesulphonamides, cyclitols and phenolic compounds. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 845-848.	5.2	72
351	Crystal structure of the most catalytically effective carbonic anhydrase enzyme known, SazCA from the thermophilic bacterium Sulfurihydrogenibium azorense. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 2002-2006.	2.2	72
352	Carbonic Anhydrases inhibitory effects of new benzenesulfonamides synthesized by using superacid chemistry. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 886-891.	5.2	71
353	Click-tailed coumarins with potent and selective inhibitory action against the tumor-associated carbonic anhydrases IX and XII. Bioorganic and Medicinal Chemistry, 2015, 23, 6955-6966.	3.0	71
354	Carbonic anhydrase inhibitors. Inhibition of the cytosolic and tumor-associated carbonic anhydrase isozymes I, II, and IX with a series of 1,3,4-thiadiazole- and 1,2,4-triazole-thiols. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 2347-2352.	2.2	70
355	Carbonic Anhydrase Inhibitors:Â Synthesis and Inhibition of Cytosolic/Membrane-Associated Carbonic Anhydrase Isozymes I, II, and IX with Sulfonamides Incorporating Hydrazino Moieties. Journal of Medicinal Chemistry, 2005, 48, 2121-2125.	6.4	70
356	Carbonic anhydrase inhibitors: Inhibition of Plasmodium falciparum carbonic anhydrase with aromatic/heterocyclic sulfonamides—in vitro and in vivo studies. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 5466-5471.	2.2	70
357	Carbonic anhydrase inhibitors. Identification of selective inhibitors of the human mitochondrial isozymes VA and VB over the cytosolic isozymes I and II from a natural product-based phenolic library. Bioorganic and Medicinal Chemistry, 2010, 18, 14-18.	3.0	70
358	Carbonic anhydrase inhibitors. The X-ray crystal structure of human isoform II in adduct with an adamantyl analogue of acetazolamide resides in a less utilized binding pocket than most hydrophobic inhibitors. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 4376-4381.	2.2	70
359	Inhibition studies with anions and small molecules of two novel β-carbonic anhydrases from the bacterial pathogen Salmonella enterica serovar Typhimurium. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 3591-3595.	2.2	70
360	7-Substituted-sulfocoumarins are isoform-selective, potent carbonic anhydrase II inhibitors. Bioorganic and Medicinal Chemistry, 2013, 21, 4502-4510.	3.0	70

#	Article	IF	CITATIONS
361	New light on bacterial carbonic anhydrases phylogeny based on the analysis of signal peptide sequences. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1254-1260.	5.2	70
362	Synthesis, characterisation, biological evaluation and <i>in silico</i> studies of sulphonamide Schiff bases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 950-962.	5.2	70
363	An Overview of the Carbonic Anhydrases from Two Pathogens of the Oral Cavity: Streptococcus mutans and Porphyromonas gingivalis. Current Topics in Medicinal Chemistry, 2016, 16, 2359-2368.	2.1	70
364	Carbonic anhydrase inhibitors: X-ray crystallographic structure of the adduct of human isozyme II with the antipsychotic drug sulpiride. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 337-341.	2.2	69
365	Carbonic anhydrase inhibitors. Inhibition of the β-class enzymes from the fungal pathogens Candida albicans and Cryptococcus neoformans with aliphatic and aromatic carboxylates. Bioorganic and Medicinal Chemistry, 2009, 17, 2654-2657.	3.0	69
366	Anticonvulsant 4-Aminobenzenesulfonamide Derivatives with Branched-Alkylamide Moieties: X-ray Crystallography and Inhibition Studies of Human Carbonic Anhydrase Isoforms I, II, VII, and XIV. Journal of Medicinal Chemistry, 2011, 54, 3977-3981.	6.4	69
367	Anion inhibition studies of the fastest carbonic anhydrase (CA) known, the extremo-CA from the bacterium Sulfurihydrogenibium azorense. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 7142-7145.	2.2	69
368	Design, Synthesis, and Evaluation of Hydroxamic Acid Derivatives as Promising Agents for the Management of Chagas Disease. Journal of Medicinal Chemistry, 2014, 57, 298-308.	6.4	69
369	Saccharin: A lead compound for structure-based drug design of carbonic anhydrase IX inhibitors. Bioorganic and Medicinal Chemistry, 2015, 23, 849-854.	3.0	69
370	Synthesis and biological activity of novel thiourea derivatives as carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 75-80.	5.2	69
371	Benzoxaborole as a new chemotype for carbonic anhydrase inhibition. Chemical Communications, 2016, 52, 11983-11986.	4.1	69
372	Steroids interfere with human carbonic anhydrase activity by using alternative binding mechanisms. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1453-1459.	5.2	69
373	Carbonic anhydrase activators: Human isozyme II is strongly activated by oligopeptides incorporating the carboxyterminal sequence of the bicarbonate anion exchanger AE1. Bioorganic and Medicinal Chemistry Letters, 2002, 12, 1177-1180.	2.2	68
374	Carbonic anhydrase inhibitors: N-(p-sulfamoylphenyl)-α-d-glycopyranosylamines as topically acting antiglaucoma agents in hypertensive rabbits. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 225-229.	2.2	68
375	α-Carbonic anhydrases are sulfatases with cyclic diol monosulfate esters. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 148-154.	5.2	68
376	The extremo-α-carbonic anhydrase from the thermophilic bacterium Sulfurihydrogenibium azorense is highly inhibited by sulfonamides. Bioorganic and Medicinal Chemistry, 2013, 21, 4521-4525.	3.0	68
377	Phenols and Polyphenols as Carbonic Anhydrase Inhibitors. Molecules, 2016, 21, 1649.	3.8	68
378	Carbonic anhydrase inhibitors: sulfonamides incorporating furan-, thiophene- and pyrrole-carboxamido groups possess strong topical intraocular pressure lowering properties as aqueous suspensions. Bioorganic and Medicinal Chemistry, 2000, 8, 2145-2155.	3.0	67

#	Article	IF	CITATIONS
379	An Update in the Development of HIV Entry Inhibitors. Current Topics in Medicinal Chemistry, 2007, 7, 1273-1289.	2.1	67
380	Membrane-bound carbonic anhydrases in osteoclasts. Bone, 2007, 40, 1021-1031.	2.9	67
381	Carbonic anhydrase inhibitors. Interaction of indapamide and related diuretics with 12 mammalian isozymes and X-ray crystallographic studies for the indapamide–isozyme II adduct. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 2567-2573.	2.2	67
382	The protein tyrosine kinase inhibitors imatinib and nilotinib strongly inhibit several mammalian α-carbonic anhydrase isoforms. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 4102-4106.	2.2	67
383	The management of diabetes mellitus-imperative role of natural products against dipeptidyl peptidase-4, α-glucosidase and sodium-dependent glucose co-transporter 2 (SGLT2). Bioorganic Chemistry, 2019, 86, 305-315.	4.1	67
384	Protease Inhibitors:Â Synthesis of Potent Bacterial Collagenase and Matrix Metalloproteinase Inhibitors IncorporatingN-4-Nitrobenzylsulfonylglycine Hydroxamate Moieties. Journal of Medicinal Chemistry, 2000, 43, 1858-1865.	6.4	66
385	Recent Developments of Carbonic Anhydrase Inhibitors as Potential Anticancer Drugs. Journal of Medicinal Chemistry, 2008, 51, 3051-3056.	6.4	66
386	Nanoscale enzyme inhibitors: Fullerenes inhibit carbonic anhydrase by occluding the active site entrance. Bioorganic and Medicinal Chemistry, 2010, 18, 2822-2828.	3.0	66
387	Inhibition and binding studies of carbonic anhydrase isozymes I, II and IX with benzimidazo[1,2-c][1,2,3]thiadiazole-7-sulphonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2010, 25, 863-870.	5.2	66
388	Polypharmacology of sulfonamides: pazopanib, a multitargeted receptor tyrosine kinase inhibitor in clinical use, potently inhibits several mammalian carbonic anhydrases. Chemical Communications, 2012, 48, 8177.	4.1	66
389	Biochemical characterization of recombinant β-carbonic anhydrase (PgiCAb) identified in the genome of the oral pathogenic bacterium <i>Porphyromonas gingivalis</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 366-370.	5.2	66
390	Antibacterial carbonic anhydrase inhibitors: an update on the recent literature. Expert Opinion on Therapeutic Patents, 2020, 30, 963-982.	5.0	66
391	Novel Aromatic/Heterocyclic Sulfonamides and Their Metal Complexes as Inhibitors of Carbonic Anhydraseisozymes I, II and IV. Journal of Enzyme Inhibition and Medicinal Chemistry, 1997, 12, 37-51.	0.5	65
392	Carbonic anhydrase activators: Kinetic and X-ray crystallographic study for the interaction of d- and I-tryptophan with the mammalian isoforms I–XIV. Bioorganic and Medicinal Chemistry, 2008, 16, 8373-8378.	3.0	65
393	The history and rationale of using carbonic anhydrase inhibitors in the treatment of peptic ulcers. In memoriam Ioan Puşcaş (1932–2015). Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 527-	5 33.	65
394	Genome-wide synthetic lethal screen unveils novel CAIX-NFS1/xCT axis as a targetable vulnerability in hypoxic solid tumors. Science Advances, 2021, 7, .	10.3	65
395	Carbonic Anhydrase Inhibitors: Aromatic Sulfonamides and Disulfonamides Act as Efficient Tumor Growth Inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2000, 15, 597-610.	0.5	64
396	Carbonic anhydrase inhibition with natural products: novel chemotypes and inhibition mechanisms. Molecular Diversity, 2011, 15, 305-316.	3.9	64

#	Article	IF	CITATIONS
397	Biochemical characterization of the Î-carbonic anhydrase from the marine diatom <i>Thalassiosira weissflogii</i> , TweCA. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 906-911.	5.2	64
398	Biochemical characterization of the γ-carbonic anhydrase from the oral pathogen Porphyromonas gingivalis, PgiCA. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 532-537.	5.2	64
399	Cloning, characterization and anion inhibition study of the Î-class carbonic anhydrase (TweCA) from the marine diatom Thalassiosira weissflogii. Bioorganic and Medicinal Chemistry, 2014, 22, 531-537.	3.0	64
400	Supported ionic liquid membranes immobilized with carbonic anhydrases for CO2 transport at high temperatures. Journal of Membrane Science, 2017, 528, 225-230.	8.2	64
401	The synthesis of novel sulfamides derived from β-benzylphenethylamines as acetylcholinesterase, butyrylcholinesterase and carbonic anhydrase enzymes inhibitors. Bioorganic Chemistry, 2017, 74, 238-250.	4.1	64
402	The Possible Role of Helicobacter pylori in Gastric Cancer and Its Management. Frontiers in Oncology, 2019, 9, 75.	2.8	64
403	Synthesis of nitrogen, phosphorus, selenium and sulfur-containing heterocyclic compounds – Determination of their carbonic anhydrase, acetylcholinesterase, butyrylcholinesterase and α-glycosidase inhibition properties. Bioorganic Chemistry, 2020, 103, 104171.	4.1	64
404	Carbonic Anhydrase Activators:  High Affinity Isozymes I, II, and IV Activators, Incorporating a β-Alanyl-histidine Scaffold. Journal of Medicinal Chemistry, 2002, 45, 284-291.	6.4	63
405	QSAR study on para-substituted aromatic sulfonamides as carbonic anhydrase II inhibitors using topological information indices. Bioorganic and Medicinal Chemistry, 2006, 14, 1108-1114.	3.0	63
406	Inhibition of membrane-associated carbonic anhydrase isozymes IX, XII and XIV with a library of glycoconjugate benzenesulfonamides. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 987-992.	2.2	63
407	Carbonic anhydrase inhibitors: Inhibition of the new membrane-associated isoform XV with phenols. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 3593-3596.	2.2	63
408	Coumarinyl-substituted sulfonamides strongly inhibit several human carbonic anhydrase isoforms: solution and crystallographic investigations. Bioorganic and Medicinal Chemistry, 2010, 18, 4873-4878.	3.0	63
409	Characterization and anions inhibition studies of an α-carbonic anhydrase from the teleost fish Dicentrarchus labrax. Bioorganic and Medicinal Chemistry, 2011, 19, 744-748.	3.0	63
410	Hydroxamate represents a versatile zinc binding group for the development of new carbonic anhydrase inhibitors. Chemical Communications, 2012, 48, 8838.	4.1	63
411	Synthesis and evaluation of ¹⁸ F-labeled carbonic anhydrase IX inhibitors for imaging with positron emission tomography. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 249-255.	5.2	63
412	Kinetic and X-ray crystallographic investigations on carbonic anhydrase isoforms I, II, IX and XII of a thioureido analog of SLC-0111. Bioorganic and Medicinal Chemistry, 2016, 24, 976-981.	3.0	63
413	A highly catalytically active Î ³ -carbonic anhydrase from the pathogenic anaerobe Porphyromonas gingivalis and its inhibition profile with anions and small molecules. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 4067-4071.	2.2	62
414	Discovery of New Selenoureido Analogues of 4-(4-Fluorophenylureido)benzenesulfonamide as Carbonic Anhydrase Inhibitors. ACS Medicinal Chemistry Letters, 2017, 8, 963-968.	2.8	62

#	Article	IF	CITATIONS
415	Deciphering the Mechanism of Human Carbonic Anhydrases Inhibition with Sulfocoumarins: Computational and Experimental Studies. Chemistry - A European Journal, 2018, 24, 7840-7844.	3.3	62
416	Inhibition of pH regulation as a therapeutic strategy in hypoxic human breast cancer cells. Oncotarget, 2017, 8, 42857-42875.	1.8	62
417	Organometallic-based antibacterial and antifungal compounds: transition metal complexes of 1,1′-diacetylferrocene-derived thiocarbohydrazone, carbohydrazone, thiosemicarbazone and semicarbazone. Journal of Enzyme Inhibition and Medicinal Chemistry, 2005, 20, 81-89.	5.2	61
418	The Development of Topically Acting Carbonic Anhydrase Inhibitors as Antiglaucoma Agents. Current Topics in Medicinal Chemistry, 2007, 7, 849-854.	2.1	61
419	Cancer-associated, hypoxia-inducible carbonic anhydrase IX facilitates CO2diffusion. BJU International, 2008, 101, 22-24.	2.5	61
420	Nitric oxide-donating carbonic anhydrase inhibitors for the treatment of open-angle glaucoma. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 6565-6570.	2.2	61
421	Carbonic anhydrase inhibitors. Comparison of chlorthalidone, indapamide, trichloromethiazide, and furosemide X-ray crystal structures in adducts with isozyme II, when several water molecules make the difference. Bioorganic and Medicinal Chemistry, 2009, 17, 1214-1221.	3.0	61
422	5- and 6-Membered (thio)lactones are prodrug type carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 267-270.	2.2	61
423	6-Triazolyl-substituted sulfocoumarins are potent, selective inhibitors of the tumor-associated carbonic anhydrases IX and XII. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 1256-1260.	2.2	61
424	Carbonic anhydrase inhibitors. Synthesis, and molecular structure of novel series N-substituted N′-(2-arylmethylthio-4-chloro-5-methylbenzenesulfonyl)guanidines and their inhibition of human cytosolic isozymes I and II and the transmembrane tumor-associated isozymes IX and XII. European Journal of Medicinal Chemistry, 2014, 71, 135-147.	5.5	61
425	X-ray crystallography-promoted drug design of carbonic anhydrase inhibitors. Chemical Communications, 2015, 51, 7108-7111.	4.1	61
426	Discovery of New Sulfonamide Carbonic Anhydrase IX Inhibitors Incorporating Nitrogenous Bases. ACS Medicinal Chemistry Letters, 2017, 8, 1314-1319.	2.8	61
427	A New Kid on the Block? Carbonic Anhydrases as Possible New Targets in Alzheimer's Disease. International Journal of Molecular Sciences, 2019, 20, 4724.	4.1	61
428	Carbonic anhydrase inhibitors: an update on experimental agents for the treatment and imaging of hypoxic tumors. Expert Opinion on Investigational Drugs, 2021, 30, 1197-1208.	4.1	61
429	Sulfonamide Linked Neoglycoconjugatesâ^'A New Class of Inhibitors for Cancer-Associated Carbonic Anhydrases. Journal of Medicinal Chemistry, 2010, 53, 2913-2926.	6.4	60
430	Dual-tail arylsulfone-based benzenesulfonamides differently match the hydrophobic and hydrophilic halves of human carbonic anhydrases active sites: Selective inhibitors for the tumor-associated hCA IX isoform. European Journal of Medicinal Chemistry, 2018, 152, 1-9.	5.5	60
431	Carbonic anhydrase inhibition and the management of glaucoma: a literature and patent review 2013-2019. Expert Opinion on Therapeutic Patents, 2019, 29, 781-792.	5.0	60
432	An overview on the recently discovered iota-carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1988-1995.	5.2	60

#	Article	IF	CITATIONS
433	The importance of sulfur-containing motifs in drug design and discovery. Expert Opinion on Drug Discovery, 2022, 17, 501-512.	5.0	60
434	Carbonic anhydrase inhibitors: 4-sulfamoyl-benzenecarboxamides and 4-chloro-3-sulfamoyl-benzenecarboxamides with strong topical antiglaucoma properties. Bioorganic and Medicinal Chemistry Letters, 2001, 11, 1787-1791.	2.2	59
435	Carbonic Anhydrase Inhibitors: Schiff's Bases of Aromatic and Heterocyclic Sulfonamides and their Metal Complexes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2004, 19, 263-267.	5.2	59
436	NO-releasing esters show carbonic anhydrase inhibitory action against human isoforms I and II. Bioorganic and Medicinal Chemistry, 2010, 18, 3559-3563.	3.0	59
437	Cloning, expression and purification of the complete domain of the η -carbonic anhydrase from <i>Plasmodium falciparum</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 54-59.	5.2	59
438	Phosphorus versus Sulfur: Discovery of Benzenephosphonamidates as Versatile Sulfonamideâ€Mimic Chemotypes Acting as Carbonic Anhydrase Inhibitors. Chemistry - A European Journal, 2019, 25, 1188-1192.	3.3	59
439	Synthesis of coumarin-sulfonamide derivatives and determination of their cytotoxicity, carbonic anhydrase inhibitory and molecular docking studies. European Journal of Medicinal Chemistry, 2019, 183, 111702.	5.5	59
440	Prostate cancer cells and exosomes in acidic condition show increased carbonic anhydrase IX expression and activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 272-278.	5.2	59
441	Carbonic anhydrase inhibitors: topical sulfonamide antiglaucoma agents incorporating secondary amine moieties. Bioorganic and Medicinal Chemistry Letters, 2000, 10, 673-676.	2.2	58
442	Carbonic anhydrase inhibitors. Inhibition of the zinc and cobalt \$gamma;-class enzyme from the archaeon Methanosarcina thermophila with anions. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 3327-3331.	2.2	58
443	Indanesulfonamides as Carbonic Anhydrase Inhibitors. Toward Structure-Based Design of Selective Inhibitors of the Tumor-Associated Isozyme CA IX. Journal of Medicinal Chemistry, 2006, 49, 2743-2749.	6.4	58
444	Glycosidic carbonic anhydrase IX inhibitors: A sweet approach against cancer. Bioorganic and Medicinal Chemistry, 2013, 21, 1419-1426.	3.0	58
445	Synthesis of 4-(2-substituted hydrazinyl)benzenesulfonamides and their carbonic anhydrase inhibitory effects. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 568-573.	5.2	58
446	Structure activity study of carbonic anhydrase IX: Selective inhibition with ureido-substituted benzenesulfonamides. European Journal of Medicinal Chemistry, 2017, 132, 184-191.	5.5	58
447	Inhibitory effects and structural insights for a novel series of coumarin-based compounds that selectively target human CA IX and CA XII carbonic anhydrases. European Journal of Medicinal Chemistry, 2018, 143, 276-282.	5.5	58
448	New azafluorenones with cytotoxic and carbonic anhydrase inhibitory properties: 2-Aryl-4-(4-hydroxyphenyl)-5H-indeno[1,2-b]pyridin-5-ones. Bioorganic Chemistry, 2018, 81, 433-439.	4.1	58
449	Carbonic anhydrase catalyzes cyanamide hydration to urea: is it mimicking the physiological reaction?. Journal of Biological Inorganic Chemistry, 1999, 4, 528-536.	2.6	57
450	Phosphodiesterase 5 Inhibitors - Drug Design and Differentiation Based on Selectivity, Pharmacokinetic and Efficacy Profiles. Current Pharmaceutical Design, 2006, 12, 3459-3465.	1.9	57

#	Article	IF	CITATIONS
451	Ureido-substituted sulfamates show potent carbonic anhydrase IX inhibitory and antiproliferative activities against breast cancer cell lines. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 4681-4685.	2.2	57
452	Sulfonamide inhibition studies of the β-carbonic anhydrase from the pathogenic bacterium Vibrio cholerae. Bioorganic and Medicinal Chemistry, 2016, 24, 1115-1120.	3.0	57
453	Carbonic anhydrase inhibitors. Novel sulfanilamide/acetazolamide derivatives obtained by the tail approach and their interaction with the cytosolic isozymes I and II, and the tumor-associated isozyme IX. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 367-372.	2.2	56
454	Carbonic anhydrase inhibitors. Inhibition and homology modeling studies of the fungal β-carbonic anhydrase from Candida albicans with sulfonamides. Bioorganic and Medicinal Chemistry, 2009, 17, 4503-4509.	3.0	56
455	Carbonic Anhydrase Inhibitors. Comparison of Chlorthalidone and Indapamide X-ray Crystal Structures in Adducts with Isozyme II: When Three Water Molecules and the Ketoâ´'Enol Tautomerism Make the Difference. Journal of Medicinal Chemistry, 2009, 52, 322-328.	6.4	56
456	Inhibition studies of the β-carbonic anhydrases from the bacterial pathogen Salmonella enterica serovar Typhimurium with sulfonamides and sulfamates. Bioorganic and Medicinal Chemistry, 2011, 19, 5023-5030.	3.0	56
457	A Class of Sulfonamides with Strong Inhibitory Action against the α-Carbonic Anhydrase from <i>Trypanosoma cruzi</i> . Journal of Medicinal Chemistry, 2013, 56, 5773-5781.	6.4	56
458	Structure and inhibition studies of a type II beta-carbonic anhydrase psCA3 from Pseudomonas aeruginosa. Bioorganic and Medicinal Chemistry, 2015, 23, 4831-4838.	3.0	56
459	Novel indolin-2-one-based sulfonamides as carbonic anhydrase inhibitors: Synthesis, inÂvitro biological evaluation against carbonic anhydrases isoforms I, II, IV and VII and molecular docking studies. European Journal of Medicinal Chemistry, 2017, 127, 521-530.	5.5	56
460	Tumor-associated carbonic anhydrase isoform IX and XII inhibitory properties of certain isatin-bearing sulfonamides endowed with in vitro antitumor activity towards colon cancer. Bioorganic Chemistry, 2018, 81, 425-432.	4.1	56
461	Selenols: a new class of carbonic anhydrase inhibitors. Chemical Communications, 2019, 55, 648-651.	4.1	56
462	Synthesis and anti-inflammatory activity of sulfonamides and carboxylates incorporating trimellitimides: Dual cyclooxygenase/carbonic anhydrase inhibitory actions. Bioorganic Chemistry, 2019, 84, 260-268.	4.1	56
463	Coumarin carbonic anhydrase inhibitors from natural sources. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1462-1470.	5.2	56
464	New selective carbonic anhydrase IX inhibitors: Synthesis and pharmacological evaluation of diarylpyrazole-benzenesulfonamides. Bioorganic and Medicinal Chemistry, 2013, 21, 1451-1464.	3.0	55
465	The extremo-α-carbonic anhydrase (CA) from Sulfurihydrogenibium azorense, the fastest CA known, is highly activated by amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 1087-1090.	2.2	55
466	Structural Insights on Carbonic Anhydrase Inhibitory Action, Isoform Selectivity, and Potency of Sulfonamides and Coumarins Incorporating Arylsulfonylureido Groups. Journal of Medicinal Chemistry, 2014, 57, 9152-9167.	6.4	55
467	Discovery of novel isatin-based sulfonamides with potent and selective inhibition of the tumor-associated carbonic anhydrase isoforms IX and XII. Organic and Biomolecular Chemistry, 2015, 13, 6493-6499.	2.8	55
468	A novel library of saccharin and acesulfame derivatives as potent and selective inhibitors of carbonic anhydrase IX and XII isoforms. Bioorganic and Medicinal Chemistry, 2016, 24, 1095-1105.	3.0	55

#	Article	IF	CITATIONS
469	Geographical characterization by MAE-HPLC and NIR methodologies and carbonic anhydrase inhibition of Saffron components. Food Chemistry, 2017, 221, 855-863.	8.2	55
470			



#	Article	IF	CITATIONS
487	PEGylated Bis-Sulfonamide Carbonic Anhydrase Inhibitors Can Efficiently Control the Growth of Several Carbonic Anhydrase IX-Expressing Carcinomas. Journal of Medicinal Chemistry, 2016, 59, 5077-5088.	6.4	53
488	Synthesis of 4-(thiazol-2-ylamino)-benzenesulfonamides with carbonic anhydrase I, II and IX inhibitory activity and cytotoxic effects against breast cancer cell lines. Bioorganic and Medicinal Chemistry, 2016, 24, 3043-3051.	3.0	53
489	Synthesis and biological evaluation of novel aromatic and heterocyclic bis-sulfonamide Schiff bases as carbonic anhydrase I, II, VII and IX inhibitors. Bioorganic and Medicinal Chemistry, 2017, 25, 3093-3097.	3.0	53
490	Discovery of β-Adrenergic Receptors Blocker–Carbonic Anhydrase Inhibitor Hybrids for Multitargeted Antiglaucoma Therapy. Journal of Medicinal Chemistry, 2018, 61, 5380-5394.	6.4	53
491	Discovery of Novel Nonsteroidal Anti-Inflammatory Drugs and Carbonic Anhydrase Inhibitors Hybrids (NSAIDs–CAIs) for the Management of Rheumatoid Arthritis. Journal of Medicinal Chemistry, 2018, 61, 4961-4977.	6.4	53
492	Synthesis and biological evaluation of some new mono Mannich bases with piperazines as possible anticancer agents and carbonic anhydrase inhibitors. Bioorganic Chemistry, 2019, 90, 103095.	4.1	53
493	SLC-0111 enaminone analogs, 3/4-(3-aryl-3-oxopropenyl) aminobenzenesulfonamides, as novel selective subnanomolar inhibitors of the tumor-associated carbonic anhydrase isoform IX. Bioorganic Chemistry, 2019, 83, 549-558.	4.1	53
494	Carbonic anhydrase inhibitors. Synthesis and inhibition of cytosolic/tumor-associated carbonic anhydrase isozymes I, II, and IX with boron-containing sulfonamides, sulfamides, and sulfamates: Toward agents for boron neutron capture therapy of hypoxic tumors. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 3302-3306.	2.2	52
495	Synthesis and antimalarial activity of novel chiral and achiral benzenesulfonamides bearing 1, 3, 4-oxadiazole moieties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2007, 22, 301-308.	5.2	52
496	Carbonic anhydrase activators: The first activation study of the human secretory isoform VI with amino acids and amines. Bioorganic and Medicinal Chemistry, 2007, 15, 5351-5357.	3.0	52
497	Dual Inhibitors of Matrix Metalloproteinases and Carbonic Anhydrases: Iminodiacetyl-Based Hydroxamateâ~'Benzenesulfonamide Conjugates. Journal of Medicinal Chemistry, 2008, 51, 7968-7979.	6.4	52
498	Molecular Cloning, Characterization, and Inhibition Studies of a Î ² -Carbonic Anhydrase from <i>Malassezia globosa</i> , a Potential Antidandruff Target. Journal of Medicinal Chemistry, 2012, 55, 3513-3520.	6.4	52
499	Development of Potent Carbonic Anhydrase Inhibitors Incorporating Both Sulfonamide and Sulfamide Groups. Journal of Medicinal Chemistry, 2012, 55, 6776-6783.	6.4	52
500	Synthesis, characterization and biological studies of sulfonamide Schiff's bases and some of their metal derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 58-68.	5.2	52
501	Sulfonamide inhibition studies of the Îclass carbonic anhydrase from the malaria pathogen Plasmodium falciparum. Bioorganic and Medicinal Chemistry, 2015, 23, 526-531.	3.0	52
502	Synthesis, cytotoxicity and carbonic anhydrase inhibitory activities of new pyrazolines. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 20-24.	5.2	52
503	Carbonic anhydrases from Trypanosoma and Leishmania as anti-protozoan drug targets. Bioorganic and Medicinal Chemistry, 2017, 25, 1543-1555.	3.0	52
504	Synthesis and biological evaluation of histamine Schiff bases as carbonic anhydrase I, II, IV, VII, and IX activators. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1305-1312.	5.2	52

#	Article	IF	CITATIONS
505	Nanoemulsions of sulfonamide carbonic anhydrase inhibitors strongly inhibit the growth of <i>Trypanosoma cruzi</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 139-146.	5.2	52
506	Continued exploration of 1,2,4-oxadiazole periphery for carbonic anhydrase-targeting primary arene sulfonamides: Discovery of subnanomolar inhibitors of membrane-bound hCA IX isoform that selectively kill cancer cells in hypoxic environment. European Journal of Medicinal Chemistry, 2019, 164, 92-105.	5.5	52
507	Carbonic Anhydrase Inhibitors. Arylsulfonylureido-and Arylureido-Substituted Aromatic and Heterocyclic Sulfonamides: Towards Selective Inhibitors of Carbonic Anhydrase Isozyme I. Journal of Enzyme Inhibition and Medicinal Chemistry, 1999, 14, 343-363.	0.5	51
508	Carbonic anhydrase inhibitors. Inhibition of the cytosolic human isozymes I and II, and the transmembrane, tumor-associated isozymes IX and XII with substituted aromatic sulfonamides activatable in hypoxic tumors. Bioorganic and Medicinal Chemistry Letters, 2006, 16, 4846-4851.	2.2	51
509	Inhibition studies of a β-carbonic anhydrase from Brucella suis with a series of water soluble glycosyl sulfanilamides. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 2178-2182.	2.2	51
510	Characterization and inhibition studies of an α-carbonic anhydrase from the endangered sturgeon species <i>Acipenser gueldenstaedti</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2011, 26, 895-900.	5.2	51
511	Sulfapyridine-like benzenesulfonamide derivatives as inhibitors of carbonic anhydrase isoenzymes I, II and VI. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 818-824.	5.2	51
512	Hypoxia induced CA9 inhibitory targeting by two different sulfonamide derivatives including Acetazolamide in human Glioblastoma. Bioorganic and Medicinal Chemistry, 2013, 21, 3949-3957.	3.0	51
513	Analysis of saponins and phenolic compounds as inhibitors of α-carbonic anhydrase isoenzymes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 412-417.	5.2	51
514	Synthesis and bioactivities of halogen bearing phenolic chalcones and their corresponding bis Mannich bases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 125-131.	5.2	51
515	Microwave-assisted extraction, HPLC analysis, and inhibitory effects on carbonic anhydrase I, II, VA, and VII isoforms of 14 blueberry Italian cultivars. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1-6.	5.2	51
516	Synthesis and carbonic anhydrase I, II, VII, and IX inhibition studies with a series of benzo[d]thiazole-5- and 6-sulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1071-1078.	5.2	51
517	Rethinking the Combination of Proton Exchanger Inhibitors in Cancer Therapy. Metabolites, 2018, 8, 2.	2.9	51
518	Novel hydrazido benzenesulfonamides-isatin conjugates: Synthesis, carbonic anhydrase inhibitory activity and molecular modeling studies. European Journal of Medicinal Chemistry, 2018, 157, 28-36.	5.5	51
519	Structure–Activity Relationships of C-17 Cyano-Substituted Estratrienes as Anticancer Agents. Journal of Medicinal Chemistry, 2008, 51, 1295-1308.	6.4	50
520	Carbonic anhydrase inhibitors: X-ray crystallographic studies for the binding of N-substituted benzenesulfonamides to human isoform II. Chemical Communications, 2011, 47, 11636.	4.1	50
521	Inhibition of the β-carbonic anhydrases from Mycobacterium tuberculosis with C-cinnamoyl glycosides: Identification of the first inhibitor with anti-mycobacterial activity. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 740-743.	2.2	50
522	Mono-/dihydroxybenzoic acid esters and phenol pyridinium derivatives as inhibitors of the mammalian carbonic anhydrase isoforms I, II, VII, IX, XII and XIV. Bioorganic and Medicinal Chemistry, 2013, 21, 1564-1569.	3.0	50

#	Article	IF	CITATIONS
523	Structure-based screening for the discovery of new carbonic anhydrase VII inhibitors. European Journal of Medicinal Chemistry, 2014, 71, 105-111.	5.5	50
524	Structural Insights into Carbonic Anhydrase IX Isoform Specificity of Carbohydrate-Based Sulfamates. Journal of Medicinal Chemistry, 2014, 57, 8635-8645.	6.4	50
525	Synthesis of 6-tetrazolyl-substituted sulfocoumarins acting as highly potent and selective inhibitors of the tumor-associated carbonic anhydrase isoforms IX and XII. Bioorganic and Medicinal Chemistry, 2014, 22, 1522-1528.	3.0	50
526	Sulfonamide inhibition studies of the γ-carbonic anhydrase from the oral pathogen Porphyromonas gingivalis. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 240-244.	2.2	50
527	Comparison of the sulfonamide inhibition profiles of the α-, β- and γ-carbonic anhydrases from the pathogenic bacterium Vibrio cholerae. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 1941-1946.	2.2	50
528	Design and synthesis of novel 1,3-diaryltriazene-substituted sulfonamides as potent and selective carbonic anhydrase II inhibitors. Bioorganic Chemistry, 2018, 77, 542-547.	4.1	50
529	Carbonic anhydrases from <i>Trypanosoma cruzi</i> and <i>Leishmania donovani chagasi</i> are inhibited by benzoxaboroles. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 286-289.	5.2	50
530	Bioactive isoflavones from Pueraria lobata root and starch: Different extraction techniques and carbonic anhydrase inhibition. Food and Chemical Toxicology, 2018, 112, 441-447.	3.6	50
531	pH-Sensitive Multiligand Gold Nanoplatform Targeting Carbonic Anhydrase IX Enhances the Delivery of Doxorubicin to Hypoxic Tumor Spheroids and Overcomes the Hypoxia-Induced Chemoresistance. ACS Applied Materials & Interfaces, 2018, 10, 17792-17808.	8.0	50
532	Carbonic Anhydrase Inhibitors: X-ray Crystallographic Structure of the Adduct of Human Isozyme II with the Perfluorobenzoyl Analogue of Methazolamide. Implications for the Drug Design of Fluorinated Inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2003, 18, 303-308.	5.2	49
533	Carbonic anhydrase inhibitors: inhibition of the tumor-associated isozyme IX with fluorine-containing sulfonamides. The first subnanomolar CA IX inhibitor discovered. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 2351-2356.	2.2	49
534	Carbonic anhydrase inhibitors: X-ray crystallographic structure of the adduct of human isozyme II with a topically acting antiglaucoma sulfonamide. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 2357-2361.	2.2	49
535	Carbonic anhydrase inhibitors. Inhibition of the beta-class enzyme from the methanoarchaeon Methanobacterium thermoautotrophicum (Cab) with anions. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 4563-4567.	2.2	49
536	Carbonic anhydrase inhibitors. Interaction of 2-(hydrazinocarbonyl)-3-phenyl-1H-indole-5-sulfonamide with 12 mammalian isoforms: Kinetic and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 152-158.	2.2	49
537	Carbonic Anhydrase Inhibitors: Bioreductive Nitro-Containing Sulfonamides with Selectivity for Targeting the Tumor Associated Isoforms IX and XII. Journal of Medicinal Chemistry, 2008, 51, 3230-3237.	6.4	49
538	<i>S</i> -Glycosyl Primary Sulfonamidesâ^'A New Structural Class for Selective Inhibition of Cancer-Associated Carbonic Anhydrases. Journal of Medicinal Chemistry, 2009, 52, 6421-6432.	6.4	49
539	Paraoxon, 4-nitrophenyl phosphate and acetate are substrates of α- but not of β-, γ- and ζ-carbonic anhydrases. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 6208-6212.	2.2	49
540	Modulation of Carbonic Anhydrase 9 (CA9) in Human Brain Cancer. Current Pharmaceutical Design, 2010, 16, 3288-3299.	1.9	49

#	Article	IF	CITATIONS
541	New chemotypes acting as isozyme-selective carbonic anhydrase inhibitors with low affinity for the offtarget cytosolic isoform II. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 2182-2185.	2.2	49
542	Anion inhibition studies of the α-carbonic anhydrase from the protozoan pathogen Trypanosoma cruzi, the causative agent of Chagas disease. Bioorganic and Medicinal Chemistry, 2013, 21, 4472-4476.	3.0	49
543	Sulfonamide inhibition studies of the δ-carbonic anhydrase from the diatom Thalassiosira weissflogii. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 275-279.	2.2	49
544	Anion inhibition studies of two new \hat{l}^2 -carbonic anhydrases from the bacterial pathogen Legionella pneumophila. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 1127-1132.	2.2	49
545	New ways to image and target tumour hypoxia and its molecular responses. Radiotherapy and Oncology, 2015, 116, 352-357.	0.6	49
546	Discovery of New Potential Antiâ€Infective Compounds Based on Carbonic Anhydrase Inhibitors by Rational Targetâ€Focused Repurposing Approaches. ChemMedChem, 2016, 11, 1904-1914.	3.2	49
547	Anion inhibition profiles of α-, β- and γ-carbonic anhydrases from the pathogenic bacterium Vibrio cholerae. Bioorganic and Medicinal Chemistry, 2016, 24, 3413-3417.	3.0	49
548	PET Imaging of Carbonic Anhydrase IX Expression of HT-29 Tumor Xenograft Mice with ⁶⁸ Ga-Labeled Benzenesulfonamides. Molecular Pharmaceutics, 2016, 13, 1137-1146.	4.6	49
549	Discovery of Benzenesulfonamides with Potent Human Carbonic Anhydrase Inhibitory and Effective Anticonvulsant Action: Design, Synthesis, and Pharmacological Assessment. Journal of Medicinal Chemistry, 2017, 60, 2456-2469.	6.4	49
550	Isatin: a privileged scaffold for the design of carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 68-73.	5.2	49
551	3-Hydrazinoisatin-based benzenesulfonamides as novel carbonic anhydrase inhibitors endowed with anticancer activity: Synthesis, inÂvitro biological evaluation and in silico insights. European Journal of Medicinal Chemistry, 2019, 184, 111768.	5.5	49
552	Synthesis, biological activity and multiscale molecular modeling studies of bis-coumarins as selective carbonic anhydrase IX and XII inhibitors with effective cytotoxicity against hepatocellular carcinoma. Bioorganic Chemistry, 2019, 87, 838-850.	4.1	49
553	Carbonic Anhydrase Inhibitors:Â The First On-Resin Screening of a 4-Sulfamoylphenylthiourea Library. Journal of Medicinal Chemistry, 2004, 47, 5224-5229.	6.4	48
554	Carbonic anhydrase inhibitors. Inhibition of isoforms I, II, IV, VA, VII, IX, and XIV with sulfonamides incorporating fructopyranose–thioureido tails. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 2685-2691.	2.2	48
555	Carbonic anhydrase activators: Activation of the human isoforms VII (cytosolic) and XIV (transmembrane) with amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 4107-4112.	2.2	48
556	Phosph(on)ate as a zinc-binding group in metalloenzyme inhibitors: X-ray crystal structure of the antiviral drug foscarnet complexed to human carbonic anhydrase I. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 2210-2215.	2.2	48
557	Cloning, polymorphism, and inhibition of β-carbonic anhydrase of Helicobacter pylori. Journal of Gastroenterology, 2008, 43, 849-857.	5.1	48
558	Inhibition of human mitochondrial carbonic anhydrases VA and VB with para-(4-phenyltriazole-1-yl)-benzenesulfonamide derivatives. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 4624-4627.	2.2	48

#	Article	IF	CITATIONS
559	Carbonic anhydrase inhibitors. Inhibition of transmembrane isoforms IX, XII, and XIV with less investigated anions including trithiocarbonate and dithiocarbamate. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 1548-1550.	2.2	48
560	Synthesis and evaluation of near-infrared fluorescent sulfonamide derivatives for imaging of hypoxia-induced carbonic anhydrase IX expression in tumors. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 653-657.	2.2	48
561	Carbonic anhydrase inhibitors: Benzenesulfonamides incorporating cyanoacrylamide moieties are low nanomolar/subnanomolar inhibitors of the tumor-associated isoforms IX and XII. Bioorganic and Medicinal Chemistry, 2013, 21, 1396-1403.	3.0	48
562	Carbonic anhydrase inhibitors. Phenols incorporating 2- or 3-pyridyl-ethenylcarbonyl and tertiary amine moieties strongly inhibit <i>Saccharomyces cerevisiae</i> β-carbonic anhydrase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 495-499.	5.2	48
563	4-Functionalized 1,3-diarylpyrazoles bearing benzenesulfonamide moiety as selective potent inhibitors of the tumor associated carbonic anhydrase isoforms IX and XII. European Journal of Medicinal Chemistry, 2014, 76, 284-290.	5.5	48
564	Ethylene bis-imidazoles are highly potent and selective activators for isozymes VA and VII of carbonic anhydrase, with a potential nootropic effect. Chemical Communications, 2014, 50, 5980-5983.	4.1	48
565	Carbonic Anhydrase Inhibition with Benzenesulfonamides and Tetrafluorobenzenesulfonamides Obtained via Click Chemistry. ACS Medicinal Chemistry Letters, 2014, 5, 927-930.	2.8	48
566	Protonography, a technique applicable for the analysis of î· -carbonic anhydrase activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 920-924.	5.2	48
567	Trimeric Radiofluorinated Sulfonamide Derivatives to Achieve In Vivo Selectivity for Carbonic Anhydrase IX–Targeted PET Imaging. Journal of Nuclear Medicine, 2015, 56, 1434-1440.	5.0	48
568	Probing the â€~bipolar' nature of the carbonic anhydrase active site: Aromatic sulfonamides containing 1,3-oxazol-5-yl moiety as picomolar inhibitors of cytosolic CA I and CA II isoforms. European Journal of Medicinal Chemistry, 2015, 101, 334-347.	5.5	48
569	Structure–Activity Relationship for Sulfonamide Inhibition of <i>Helicobacter pylori</i> α-Carbonic Anhydrase. Journal of Medicinal Chemistry, 2016, 59, 11098-11109.	6.4	48
570	4-Hydroxy-3-nitro-5-ureido-benzenesulfonamides Selectively Target the Tumor-Associated Carbonic Anhydrase Isoforms IX and XII Showing Hypoxia-Enhanced Antiproliferative Profiles. Journal of Medicinal Chemistry, 2018, 61, 10860-10874.	6.4	48
571	Structure–Activity Relationship Studies of Acetazolamide-Based Carbonic Anhydrase Inhibitors with Activity against <i>Neisseria gonorrhoeae</i> . ACS Infectious Diseases, 2021, 7, 1969-1984.	3.8	48
572	Inhibition of Bacterial Carbonic Anhydrases as a Novel Approach to Escape Drug Resistance. Current Topics in Medicinal Chemistry, 2017, 17, 1237-1248.	2.1	48
573	Carbonic Anhydrase Inhibitors: Synthesis of Sulfonamides Incorporating 2, 4, 6–Trisubstituted-Pyridinium-Ethylcarboxamido Moieties Possessing Membrane-Impermeability and in Vivo Selectivity for the Membrane-Bound (CA IV) Versus the Cytosolic (CA I and CA II) Isozymes. Journal of Enzyme Inhibition and Medicinal Chemistry. 2000. 15, 381-401.	0.5	47
574	Crystal Structure of a Zinc-Activated Variant of Human Carbonic Anhydrase I, CA I Michigan 1:Â Evidence for a Second Zinc Binding Site Involving Arginine Coordination. Biochemistry, 2002, 41, 6237-6244.	2.5	47
575	Carbonic anhydrase activators: Activation of isozyme XIII with amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2006, 16, 3955-3959.	2.2	47
576	Carbonic anhydrase inhibitors: Inhibition of human, bacterial, and archaeal isozymes with benzene-1,3-disulfonamides—Solution and crystallographic studies. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 4201-4207.	2.2	47

#	Article	IF	CITATIONS
577	Carbonic anhydrase inhibitors. Inhibition of the \hat{l}^2 -class enzyme from the yeast Saccharomyces cerevisiae with anions. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 6327-6331.	2.2	47
578	Carbonic anhydrase inhibitors: Two-prong versus mono-prong inhibitors of isoforms I, II, IX, and XII exemplified by photochromic cis-1,2-α-dithienylethene derivatives. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 1283-1286.	2.2	47
579	Carbonic anhydrase inhibitors. Inhibition of the fungal β-carbonic anhydrases from Candida albicans and Cryptococcus neoformans with boronic acids. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 2642-2645.	2.2	47
580	Carbonic Anhydrase Inhibitors Developed Through 'Click Tailing'. Current Pharmaceutical Design, 2010, 16, 3277-3287.	1.9	47
581	Brucella Carbonic Anhydrases: New Targets for Designing Anti-Infective Agents. Current Pharmaceutical Design, 2010, 16, 3310-3316.	1.9	47
582	Pteridine–sulfonamide conjugates as dual inhibitors of carbonic anhydrases and dihydrofolate reductase with potential antitumor activity. Bioorganic and Medicinal Chemistry, 2010, 18, 5081-5089.	3.0	47
583	Conformational variability of different sulfonamide inhibitors with thienyl-acetamido moieties attributes to differential binding in the active site of cytosolic human carbonic anhydrase isoforms. Bioorganic and Medicinal Chemistry, 2011, 19, 3732-3738.	3.0	47
584	Pharmacological inhibition of carbonic anhydrase XII interferes with cell proliferation and induces cell apoptosis in T-cell lymphomas. Cancer Letters, 2013, 333, 76-88.	7.2	47
585	New superacid synthesized (fluorinated) tertiary benzenesulfonamides acting as selective hCA IX inhibitors: toward a new mode of carbonic anhydrase inhibition by sulfonamides. Chemical Communications, 2013, 49, 6015.	4.1	47
586	Carbonic anhydrase inhibitory activity of sulfonamides and carboxylic acids incorporating cyclic imide scaffolds. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 5185-5189.	2.2	47
587	The effects of some avermectins on bovine carbonic anhydrase enzyme. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 773-778.	5.2	47
588	Benzoxaboroles as Efficient Inhibitors of the β-Carbonic Anhydrases from Pathogenic Fungi: Activity and Modeling Study. ACS Medicinal Chemistry Letters, 2017, 8, 1194-1198.	2.8	47
589	Discovery of new ureido benzenesulfonamides incorporating 1,3,5-triazine moieties as carbonic anhydrase I, II, IX and XII inhibitors. Bioorganic and Medicinal Chemistry, 2019, 27, 1588-1594.	3.0	47
590	Plasmatic exosomes from prostate cancer patients show increased carbonic anhydrase IX expression and activity and low pH. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 280-288.	5.2	47
591	Is cyanate a carbonic anhydrase substracte?. , 1997, 27, 272-278.		46
592	Carbonic anhydrase inhibitors: synthesis and inhibition of cytosolic/tumor-associated carbonic anhydrase isozymes I, II, and IX with sulfonamides derived from 4-isothiocyanato-benzolamide. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 5775-5780.	2.2	46
593	Carbonic anhydrase inhibitors: synthesis and inhibition of cytosolic/tumor-associated carbonic anhydrase isozymes I, II, IX, and XII with N-hydroxysulfamides—a new zinc-binding function in the design of inhibitors. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 2353-2358.	2.2	46
594	Anion inhibition studies of a β-carbonic anhydrase from Clostridium perfringens. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 6706-6710.	2.2	46

#	Article	IF	CITATIONS
595	A Class of 4-Sulfamoylphenyl-ï‰-aminoalkyl Ethers with Effective Carbonic Anhydrase Inhibitory Action and Antiglaucoma Effects. Journal of Medicinal Chemistry, 2014, 57, 9673-9686.	6.4	46
596	Synthesis, carbonic anhydrase inhibition and cytotoxic activity of novel chromone-based sulfonamide derivatives. European Journal of Medicinal Chemistry, 2015, 96, 425-435.	5.5	46
597	Synthesis and carbonic anhydrase inhibitory activities of new thienyl-substituted pyrazoline benzenesulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1-5.	5.2	46
598	Synthesis of 4â€[2â€(3,4â€dimethoxybenzyl)cyclopentyl]â€1,2â€dimethoxybenzene Derivatives and Evaluations of Their Carbonic Anhydrase Isoenzymes Inhibitory Effects. Chemical Biology and Drug Design, 2016, 87, 594-607.	of 3.2	46
599	Open saccharin-based secondary sulfonamides as potent and selective inhibitors of cancer-related carbonic anhydrase IX and XII isoforms. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 51-59.	5.2	46
600	Design and synthesis of novel benzenesulfonamide containing 1,2,3-triazoles as potent human carbonic anhydrase isoforms I, II, IV and IX inhibitors. European Journal of Medicinal Chemistry, 2018, 155, 545-551.	5.5	46
601	Novel synthesized SLC-0111 thiazole and thiadiazole analogues: Determination of their carbonic anhydrase inhibitory activity and molecular modeling studies. Bioorganic Chemistry, 2019, 87, 794-802.	4.1	46
602	Inclusion of a 5-fluorouracil moiety in nitrogenous bases derivatives as human carbonic anhydrase IX and XII inhibitors produced a targeted action against MDA-MB-231 and T47D breast cancer cells. European Journal of Medicinal Chemistry, 2020, 190, 112112.	5.5	46
603	Carbonic anhydrase modulation of emotional memory. Implications for the treatment of cognitive disorders. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1206-1214.	5.2	46
604	Carbonic anhydrase activators: Activation of the human tumor-associated isozymes IX and XII with amino acids and amines. Bioorganic and Medicinal Chemistry, 2008, 16, 3530-3536.	3.0	45
605	Carbonic anhydrase inhibitors. Inhibition of the β-class enzyme from the pathogenic yeast Candida glabrata with anions. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 4802-4805.	2.2	45
606	Exploring new Probenecid-based carbonic anhydrase inhibitors: Synthesis, biological evaluation and docking studies. Bioorganic and Medicinal Chemistry, 2015, 23, 5311-5318.	3.0	45
607	Inhibition studies of quinazoline-sulfonamide derivatives against the γ-CA (PgiCA) from the pathogenic bacterium, <i>Porphyromonas gingivalis</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 592-596.	5.2	45
608	Dithiocarbamates effectively inhibit the β-carbonic anhydrase from the dandruff-producing fungus Malassezia globosa. Bioorganic and Medicinal Chemistry, 2017, 25, 1260-1265.	3.0	45
609	Structural investigations on coumarins leading to chromeno[4,3-c]pyrazol-4-ones and pyrano[4,3-c]pyrazol-4-ones: New scaffolds for the design of the tumor-associated carbonic anhydrase isoforms IX and XII. European Journal of Medicinal Chemistry, 2018, 146, 47-59.	5.5	45
610	New phenolic Mannich bases with piperazines and their bioactivities. Bioorganic Chemistry, 2019, 90, 103057.	4.1	45
611	3-Methylthiazolo[3,2-a]benzimidazole-benzenesulfonamide conjugates as novel carbonic anhydrase inhibitors endowed with anticancer activity: Design, synthesis, biological and molecular modeling studies. European Journal of Medicinal Chemistry, 2020, 207, 112745.	5.5	45
612	Structural Basis for the Inhibition of Helicobacter pylori α-Carbonic Anhydrase by Sulfonamides. PLoS ONE, 2015, 10, e0127149.	2.5	45

#	Article	IF	CITATIONS
613	Cancer Therapeutic Targeting of Hypoxia Induced Carbonic Anhydrase IX: From Bench to Bedside. Cancers, 2022, 14, 3297.	3.7	45
614	Mechanism of Cyanamide Hydration Catalyzed by Carbonic Anhydrase II Suggested by Cryogenic X-ray Diffraction. Biochemistry, 2000, 39, 12391-12397.	2.5	44
615	Carbonic anhydrase inhibitors: Inhibition of human and murine mitochondrial isozymes V with anions. Bioorganic and Medicinal Chemistry Letters, 2003, 13, 2857-2861.	2.2	44
616	Carbonic anhydrase and matrix metalloproteinase inhibitors. Inhibition of human tumor-associated isozymes IX and cytosolic isozyme I and II with sulfonylated hydroxamates. Bioorganic and Medicinal Chemistry, 2007, 15, 2298-2311.	3.0	44
617	Carbonic anhydrase activators: An activation study of the human mitochondrial isoforms VA and VB with amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 1336-1340.	2.2	44
618	Carbonic anhydrase II-induced selection of inhibitors from a dynamic combinatorial library of Schiff's bases. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 6014-6017.	2.2	44
619	An Alternative Purification Method for Human Serum Paraoxonase 1 and its Interactions with Sulfonamides. Chemical Biology and Drug Design, 2010, 76, 552-558.	3.2	44
620	Synthesis and crystallographic analysis of new sulfonamides incorporating NO-donating moieties with potent antiglaucoma action. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 3216-3221.	2.2	44
621	Carbonic anhydrase regulation and CO2 sensing in the fungal pathogen Candida glabrata involves a novel Rca1p ortholog. Bioorganic and Medicinal Chemistry, 2013, 21, 1549-1554.	3.0	44
622	The structural comparison between membraneâ€associated human carbonic anhydrases provides insights into drug design of selective inhibitors. Biopolymers, 2014, 101, 769-778.	2.4	44
623	Benzenesulfonamide bearing 1,2,4-triazole scaffolds as potent inhibitors of tumor associated carbonic anhydrase isoforms hCA IX and hCA XII. Bioorganic and Medicinal Chemistry, 2014, 22, 1873-1882.	3.0	44
624	Novel sulfonamides bearing pyrrole and pyrrolopyrimidine moieties as carbonic anhydrase inhibitors: Synthesis, cytotoxic activity and molecular modeling. European Journal of Medicinal Chemistry, 2014, 87, 186-196.	5.5	44
625	Sulfonamides incorporating fluorine and 1,3,5-triazine moieties are effective inhibitors of three β -class carbonic anhydrases from <i>Mycobacterium tuberculosis</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 686-689.	5.2	44
626	Novel sulfonamide bearing coumarin scaffolds as selective inhibitors of tumor associated carbonic anhydrase isoforms IX and XII. Bioorganic and Medicinal Chemistry, 2016, 24, 2882-2886.	3.0	44
627	Cloning, characterization and anion inhibition studies of a Î ³ -carbonic anhydrase from the Antarctic bacterium Colwellia psychrerythraea. Bioorganic and Medicinal Chemistry, 2016, 24, 835-840.	3.0	44
628	Evaluation of selenide, diselenide and selenoheterocycle derivatives as carbonic anhydrase I, II, IV, VII and IX inhibitors. Bioorganic and Medicinal Chemistry, 2017, 25, 2518-2523.	3.0	44
629	Microwave-assisted synthesis and bioevaluation of new sulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 369-374.	5.2	44
630	Natural extracellular nanovesicles and photodynamic molecules: is there a future for drug delivery?. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 908-916.	5.2	44

#	Article	IF	CITATIONS
631	Synthesis of Novel Selenides Bearing Benzenesulfonamide Moieties as Carbonic Anhydrase I, II, IV, VII, and IX Inhibitors. ACS Medicinal Chemistry Letters, 2017, 8, 1213-1217.	2.8	44
632	Anticancer effects of new dibenzenesulfonamides by inducing apoptosis and autophagy pathways and their carbonic anhydrase inhibitory effects on hCA I, hCA II, hCA IX, hCA XII isoenzymes. Bioorganic Chemistry, 2018, 78, 290-297.	4.1	44
633	Heterocyclic periphery in the design of carbonic anhydrase inhibitors: 1,2,4-Oxadiazol-5-yl benzenesulfonamides as potent and selective inhibitors of cytosolic hCA II and membrane-bound hCA IX isoforms. Bioorganic Chemistry, 2018, 76, 88-97.	4.1	44
634	Famotidine, an Antiulcer Agent, Strongly Inhibits <i>Helicobacter pylori</i> and Human Carbonic Anhydrases. ACS Medicinal Chemistry Letters, 2018, 9, 1035-1038.	2.8	44
635	Design, synthesis and biological evaluation of novel ureido benzenesulfonamides incorporating 1,3,5-triazine moieties as potent carbonic anhydrase IX inhibitors. Bioorganic Chemistry, 2019, 82, 117-122.	4.1	44
636	Why hasn't there been more progress in new Chagas disease drug discovery?. Expert Opinion on Drug Discovery, 2020, 15, 145-158.	5.0	44
637	Drug Screening in Human Cells by NMR Spectroscopy Allows the Early Assessment of Drug Potency. Angewandte Chemie - International Edition, 2020, 59, 6535-6539.	13.8	44
638	SYNTHESIS AND CARBONIC ANHYDRASE INHIBITORY ACTIVITY OF 5-BENZOYLAMIDO- AND 5-(3-NITROBENZOYLAMIDO)- 1,3,4-THIADIAZOLE-2-SULFONAMIDE AND THEIR METAL COMPLEXES. Main Group Metal Chemistry, 1997, 20, .	1.6	43
639	Carbonic anhydrase inhibitors. Inhibition of the newly isolated murine isozyme XIII with anions. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 5435-5439.	2.2	43
640	Carbonic anhydrase inhibitors: synthesis and inhibition of cytosolic/tumor-associated carbonic anhydrase isozymes I, II, and IX with bis-sulfamates. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 579-584.	2.2	43
641	Inhibition of carbonic anhydrase isozymes I, II and IX with benzenesulfonamides containing an organometallic moiety. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 5032-5035.	2.2	43
642	Characterization of Carbonic Anhydrase IX Interactome Reveals Proteins Assisting Its Nuclear Localization in Hypoxic Cells. Journal of Proteome Research, 2013, 12, 282-292.	3.7	43
643	Carbonic anhydrase inhibitors: Inhibition of the β-class enzyme from the pathogenic yeast Candida glabrata with sulfonamides, sulfamates and sulfamides. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 2647-2652.	2.2	43
644	3D-QSAR CoMFA studies on sulfonamide inhibitors of the Rv3588c β-carbonic anhydrase from <i>Mycobacterium tuberculosis</i> and design of not yet synthesized new molecules. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 449-455.	5.2	43
645	Sulfonamide inhibition studies of two β-carbonic anhydrases from the bacterial pathogen Legionella pneumophila. Bioorganic and Medicinal Chemistry, 2014, 22, 2939-2946.	3.0	43
646	Synthesis of 6-aryl-substituted sulfocoumarins and investigation of their carbonic anhydrase inhibitory action. Bioorganic and Medicinal Chemistry, 2015, 23, 1430-1436.	3.0	43
647	Sulfonamide bearing pyrazolylpyrazolines as potent inhibitors of carbonic anhydrase isoforms I, II, IX and XII. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 3208-3212.	2.2	43
648	Designing carbonic anhydrase inhibitors for the treatment of breast cancer. Expert Opinion on Drug Discovery, 2015, 10, 591-597.	5.0	43

#	Article	IF	CITATIONS
649	New natural product carbonic anhydrase inhibitors incorporating phenol moieties. Bioorganic and Medicinal Chemistry, 2015, 23, 7219-7225.	3.0	43
650	A Combined Crystallographic and Theoretical Study Explains the Capability of Carboxylic Acids to Adopt Multiple Binding Modes in the Active Site of Carbonic Anhydrases. Chemistry - A European Journal, 2016, 22, 97-100.	3.3	43
651	A substituted sulfonamide and its Co (II), Cu (II), and Zn (II) complexes as potential antifungal agents. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 51-62.	5.2	43
652	7-Aryl-triazolyl-substituted sulfocoumarins are potent, selective inhibitors of the tumor-associated carbonic anhydrase IX and XII. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1226-1233.	5.2	43
653	Activation of α-, β-, γ- Î-, ζ- and Î class of carbonic anhydrases with amines and amino acids: a review. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1652-1659.	5.2	43
654	Carbonic anhydrase inhibitors: Cloning and sulfonamide inhibition studies of a carboxyterminal truncated α-carbonic anhydrase from Helicobacter pylori. Bioorganic and Medicinal Chemistry Letters, 2006, 16, 2182-2188.	2.2	42
655	Hyperchlorhidrosis Caused by Homozygous Mutation in CA12, Encoding Carbonic Anhydrase XII. American Journal of Human Genetics, 2010, 87, 713-720.	6.2	42
656	Carbonic anhydrase inhibitors: Synthesis and inhibition of the human cytosolic isozymes I and II and transmembrane isozymes IX, XII (cancer-associated) and XIV with 4-substituted 3-pyridinesulfonamides. European Journal of Medicinal Chemistry, 2010, 45, 2396-2404.	5.5	42
657	Chromone containing sulfonamides as potent carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 744-747.	5.2	42
658	Restoring catalytic activity to the human carbonic anhydrase (CA) related proteins VIII, X and XI affords isoforms with high catalytic efficiency and susceptibility to anion inhibition. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 256-260.	2.2	42
659	Extramitochondrial domain rich in carbonic anhydrase activity improves myocardial energetics. Proceedings of the National Academy of Sciences of the United States of America, 2013, 110, E958-67.	7.1	42
660	Inhibition of carbonic anhydrases from the extremophilic bacteria Sulfurihydrogenibium yellostonense (SspCA) and S. azorense (SazCA) with a new series of sulfonamides incorporating aroylhydrazone-, [1,2,4]triazolo[3,4-b][1,3,4]thiadiazinyl- or 2-(cyanophenylmethylene)-1,3,4-thiadiazol-3(2H)-yl moieties. Bioorganic and Medicinal Chemistry, 2014,	3.0	42
661	22, 141-147. N-Nitrosulfonamides: A new chemotype for carbonic anhydrase inhibition. Bioorganic and Medicinal Chemistry, 2016, 24, 3612-3617.	3.0	42
662	Design, synthesis and evaluation of ¹⁸ F-labeled cationic carbonic anhydrase IX inhibitors for PET imaging. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 722-730.	5.2	42
663	Synthesis of novel acyl selenoureido benzensulfonamides as carbonic anhydrase I, II, VII and IX inhibitors. Bioorganic and Medicinal Chemistry, 2017, 25, 3567-3573.	3.0	42
664	Synthesis and biological evaluation of benzenesulphonamide-bearing 1,4,5-trisubstituted-1,2,3-triazoles possessing human carbonic anhydrase I, II, IV, and IX inhibitory activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1187-1194.	5.2	42
665	Sulfonamide-based ring-fused analogues for CAN508 as novel carbonic anhydrase inhibitors endowed with antitumor activity: Design, synthesis, and inÂvitro biological evaluation. European Journal of Medicinal Chemistry, 2020, 189, 112019.	5.5	42
666	Benzofuran-Based Carboxylic Acids as Carbonic Anhydrase Inhibitors and Antiproliferative Agents against Breast Cancer. ACS Medicinal Chemistry Letters, 2020, 11, 1022-1027.	2.8	42

#	Article	IF	CITATIONS
667	1,3-Dipolar Cycloaddition, HPLC Enantioseparation, and Docking Studies of Saccharin/Isoxazole and Saccharin/Isoxazoline Derivatives as Selective Carbonic Anhydrase IX and XII Inhibitors. Journal of Medicinal Chemistry, 2020, 63, 2470-2488.	6.4	42
668	Carbonic Anhydrases: New Perspectives on Protein Functional Role and Inhibition in Helicobacter pylori. Frontiers in Microbiology, 2021, 12, 629163.	3.5	42
669	Dual Cyclooxygenase and Carbonic Anhydrase Inhibition by Nonsteroidal Anti-Inflammatory Drugs for the Treatment of Cancer. Current Medicinal Chemistry, 2015, 22, 2812-2818.	2.4	42
670	Carbonic Anhydrase Inhibitors. V: Pyrylium Salts in the Synthesis of Isozyme-Specific Inhibitors. Journal of Pharmaceutical Sciences, 1992, 81, 716-719.	3.3	41
671	Carbonic anhydrase inhibitors — Part 47: Quantum chemical quantitative structure-activity relationships for a group of sulfanilamide Schiff base inhibitors of carbonic anhydrase. European Journal of Medicinal Chemistry, 1998, 33, 489-500.	5.5	41
672	Malarial Parasite Carbonic Anhydrase and Its Inhibitors. Current Topics in Medicinal Chemistry, 2007, 7, 909-917.	2.1	41
673	Dual Carbonic Anhydrase - Cyclooxygenase-2 Inhibitors. Current Topics in Medicinal Chemistry, 2007, 7, 885-891.	2.1	41
674	Carbonic anhydrase inhibitors. Inhibition of cytosolic isoforms I and II, and extracellular isoforms IV, IX, and XII with sulfamides incorporating sugar moieties. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 5086-5090.	2.2	41
675	Salen and tetrahydrosalen derivatives act as effective inhibitors of the tumor-associated carbonic anhydrase XII—A new scaffold for designing isoform-selective inhibitors. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 6759-6763.	2.2	41
676	Development and biological evaluation of 99mTc-sulfonamide derivatives for inÂvivo visualization of CA IX as surrogate tumor hypoxia markers. European Journal of Medicinal Chemistry, 2014, 71, 374-384.	5.5	41
677	Quinazoline–sulfonamides with potent inhibitory activity against the α-carbonic anhydrase from Vibrio cholerae. Bioorganic and Medicinal Chemistry, 2014, 22, 5133-5140.	3.0	41
678	Protonography, a powerful tool for analyzing the activity and the oligomeric state of the Î ³ -carbonic anhydrase identified in the genome of Porphyromonas gingivalis. Bioorganic and Medicinal Chemistry, 2015, 23, 3747-3750.	3.0	41
679	Interaction of carbonic anhydrase isozymes I, II, and IX with some pyridine and phenol hydrazinecarbothioamide derivatives. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 5636-5641.	2.2	41
680	Legionella pneumophila Carbonic Anhydrases: Underexplored Antibacterial Drug Targets. Pathogens, 2016, 5, 44.	2.8	41
681	Development of certain new 2-substituted-quinazolin-4-yl-aminobenzenesulfonamide as potential antitumor agents. European Journal of Medicinal Chemistry, 2016, 109, 247-253.	5.5	41
682	3 <i>H</i> -1,2-benzoxathiepine 2,2-dioxides: a new class of isoform-selective carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 767-775.	5.2	41
683	Inhibition of Malassezia globosa carbonic anhydrase with phenols. Bioorganic and Medicinal Chemistry, 2017, 25, 2577-2582.	3.0	41
684	Synthesis of novel 4-functionalized 1,5-diaryl-1,2,3-triazoles containing benzenesulfonamide moiety as carbonic anhydrase I, II, IV and IX inhibitors. European Journal of Medicinal Chemistry, 2018, 150, 678-686.	5.5	41

#	Article	IF	CITATIONS
685	First evaluation of organotellurium derivatives as carbonic anhydrase I, II, IV, VII and IX inhibitors. Bioorganic Chemistry, 2018, 76, 268-272.	4.1	41
686	Discovery of novel 1,3-diaryltriazene sulfonamides as carbonic anhydrase I, II, VII, and IX inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1575-1580.	5.2	41
687	Anti- <i>Helicobacter pylori</i> activity of ethoxzolamide. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1660-1667.	5.2	41
688	Carbonic anhydrase inhibitors: X-ray crystal structure of a benzenesulfonamide strong CA II and CA IX inhibitor bearing a pentafluorophenylaminothioureido tail in complex with isozyme II. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 1937-1942.	2.2	40
689	In-vitro antibacterial, antifungal and cytotoxic properties of metal-based furanyl derived sulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2006, 21, 771-781.	5.2	40
690	Carbonic Anhydrase-Encoded Dynamic Constitutional Libraries: Toward the Discovery of Isozyme-Specific Inhibitors. Journal of Medicinal Chemistry, 2009, 52, 4853-4859.	6.4	40
691	The first example of a significant active site conformational rearrangement in a carbonic anhydrase-inhibitor adduct: the carbonic anhydrase l–topiramate complex. Organic and Biomolecular Chemistry, 2010, 8, 3528.	2.8	40
692	The Xâ€ray Structure of the Adduct between NAMIâ€A and Carbonic Anhydrase Provides Insights into the Reactivity of this Metallodrug with Proteins. ChemMedChem, 2010, 5, 1989-1994.	3.2	40
693	Cyclic tertiary sulfamates: Selective inhibition of the tumor-associated carbonic anhydrases IX and XII by N- and O-substituted acesulfame derivatives. European Journal of Medicinal Chemistry, 2014, 84, 240-246.	5.5	40
694	Crystal structures of two tetrameric β arbonic anhydrases from the filamentous ascomycete <i>SordariaÂmacrospora</i> . FEBS Journal, 2014, 281, 1759-1772.	4.7	40
695	Computational investigation of the selectivity of salen and tetrahydrosalen compounds towards the tumor-associated hCA XII isozyme. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 114-118.	5.2	40
696	Investigation of arenesulfonyl-2-imidazolidinones as potent carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 81-84.	5.2	40
697	[18F]VM4-037 MicroPET Imaging and Biodistribution of Two In Vivo CAIX-Expressing Tumor Models. Molecular Imaging and Biology, 2015, 17, 615-619.	2.6	40
698	Synthesis of a new series of dithiocarbamates with effective human carbonic anhydrase inhibitory activity and antiglaucoma action. Bioorganic and Medicinal Chemistry, 2015, 23, 2368-2376.	3.0	40
699	Discovery of 1,1′-Biphenyl-4-sulfonamides as a New Class of Potent and Selective Carbonic Anhydrase XIV Inhibitors. Journal of Medicinal Chemistry, 2015, 58, 8564-8572.	6.4	40
700	Inhibition of human carbonic anhydrase isozymes I, II, IX and XII with a new series of sulfonamides incorporating aroylhydrazone-, [1,2,4]triazolo[3,4-b][1,3,4]thiadiazinyl- or 2-(cyanophenylmethylene)-1,3,4-thiadiazol-3(2H)-yl moieties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 52-56.	5.2	40
701	Drosophila melanogaster: a model organism for controllingDipteranvectors and pests. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 505-513.	5.2	40
702	An Unusual Natural Product Primary Sulfonamide: Synthesis, Carbonic Anhydrase Inhibition, and Protein X-ray Structures of Psammaplin C. Journal of Medicinal Chemistry, 2016, 59, 5462-5470.	6.4	40

#	Article	IF	CITATIONS
703	Synthesis and carbonic anhydrase inhibitory properties of novel chalcone substituted benzenesulfonamides. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 5867-5870.	2.2	40
704	Probing Molecular Interactions between Human Carbonic Anhydrases (hCAs) and a Novel Class of Benzenesulfonamides. Journal of Medicinal Chemistry, 2017, 60, 4316-4326.	6.4	40
705	Agents for the prevention and treatment of age-related macular degeneration and macular edema: a literature and patent review. Expert Opinion on Therapeutic Patents, 2019, 29, 761-767.	5.0	40
706	Sulfur, selenium and tellurium containing amines act as effective carbonic anhydrase activators. Bioorganic Chemistry, 2019, 87, 516-522.	4.1	40
707	Inhibition of α-, β-, γ-, δ-, ζ- and Îclass carbonic anhydrases from bacteria, fungi, algae, diatoms and protozoans with famotidine. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 644-650.	5.2	40
708	Expanding the anticancer potential of 1,2,3-triazoles via simultaneously targeting Cyclooxygenase-2, 15-lipoxygenase and tumor-associated carbonic anhydrases. European Journal of Medicinal Chemistry, 2020, 200, 112439.	5.5	40
709	Analysis of Human Carbonic Anhydrase II:  Docking Reliability and Receptor-Based 3D-QSAR Study. Journal of Chemical Information and Modeling, 2007, 47, 515-525.	5.4	39
710	Anticancer steroid sulfatase inhibitors: synthesis of a potent fluorinated second-generation agent, <i>in vitro</i> and <i>in vivo</i> activities, molecular modeling, and protein crystallography. Molecular Cancer Therapeutics, 2008, 7, 2435-2444.	4.1	39
711	Editorial [Carbonic Anhydrases as Drug Targets Executive Editor: Claudiu T. Supuran]. Current Pharmaceutical Design, 2008, 14, 601-602.	1.9	39
712	Carbonic anhydrase inhibitors. Aromatic/heterocyclic sulfonamides incorporating phenacetyl, pyridylacetyl and thienylacetyl tails act as potent inhibitors of human mitochondrial isoforms VA and VB. Bioorganic and Medicinal Chemistry, 2009, 17, 4894-4899.	3.0	39
713	Superacid synthesis of halogen containing N-substituted-4-aminobenzene sulfonamides: New selective tumor-associated carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry, 2013, 21, 1555-1563.	3.0	39
714	Carbonic anhydrase inhibitors: Design, synthesis, kinetic, docking and molecular dynamics analysis of novel glycine and phenylalanine sulfonamide derivatives. Bioorganic and Medicinal Chemistry, 2015, 23, 7353-7358.	3.0	39
715	6-Substituted 1,2-benzoxathiine-2,2-dioxides are isoform-selective inhibitors of human carbonic anhydrases IX, XII and VA. Organic and Biomolecular Chemistry, 2015, 13, 77-80.	2.8	39
716	Coral Carbonic Anhydrases: Regulation by Ocean Acidification. Marine Drugs, 2016, 14, 109.	4.6	39
717	Synthesis and inhibitory properties of some carbamates on carbonic anhydrase and acetylcholine esterase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1484-1491.	5.2	39
718	Anion inhibition studies of the β-carbonic anhydrase from the pathogenic bacterium Vibrio cholerae. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 1406-1410.	2.2	39
719	N -Substituted and ring opened saccharin derivatives selectively inhibit transmembrane, tumor-associated carbonic anhydrases IX and XII. Bioorganic and Medicinal Chemistry, 2017, 25, 3583-3589.	3.0	39
720	Carbonic Anhydrase from Porphyromonas Gingivalis as a Drug Target. Pathogens, 2017, 6, 30.	2.8	39

#	Article	IF	CITATIONS
721	Heterocoumarins Are Selective Carbonic Anhydrase IX and XII Inhibitors with Cytotoxic Effects against Cancer Cells Lines. ACS Medicinal Chemistry Letters, 2018, 9, 947-951.	2.8	39
722	Design, synthesis and X-ray crystallography of selenides bearing benzenesulfonamide moiety with neuropathic pain modulating effects. European Journal of Medicinal Chemistry, 2018, 154, 210-219.	5.5	39
723	Targeting Tumor Associated Carbonic Anhydrases IX and XII: Highly Isozyme Selective Coumarin and Psoralen Inhibitors. ACS Medicinal Chemistry Letters, 2018, 9, 725-729.	2.8	39
724	Synthesis and Evaluation of Carbonic Anhydrase Inhibitors with Carbon Monoxide Releasing Properties for the Management of Rheumatoid Arthritis. Journal of Medicinal Chemistry, 2019, 62, 7233-7249.	6.4	39
725	Discovery of new organoselenium compounds as antileishmanial agents. Bioorganic Chemistry, 2019, 86, 339-345.	4.1	39
726	Carbonic Anhydrase Inhibitors. Synthesis of Topically Effective Intraocular Pressure Lowering Agents Derived from 5-(ω-Amino-Alkylcarboxamido)-1,3,4-Thia-Diazole-2-Sulfonamide. Journal of Enzyme Inhibition and Medicinal Chemistry, 1999, 15, 23-46.	0.5	38
727	Hydroxyurea is a carbonic anhydrase inhibitor. Bioorganic and Medicinal Chemistry, 2003, 11, 2241-2246.	3.0	38
728	Carbonic anhydrase inhibitors. Inhibition of cytosolic isozyme XIII with aromatic and heterocyclic sulfonamides: a novel target for the drug design. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 3757-3762.	2.2	38
729	Carbonic Anhydrase Inhibitors:  Synthesis and Topical Intraocular Pressure Lowering Effects of Fluorine-Containing Inhibitors Devoid of Enhanced Reactivity. Journal of Medicinal Chemistry, 2004, 47, 2796-2804.	6.4	38
730	Carbonic anhydrase inhibitors: Binding of an antiglaucoma glycosyl-sulfanilamide derivative to human isoform II and its consequences for the drug design of enzyme inhibitors incorporating sugar moieties. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 1726-1731.	2.2	38
731	Development of small molecule carbonic anhydrase IX inhibitors. BJU International, 2008, 101, 39-40.	2.5	38
732	Inhibition of carbonic anhydrase isozymes with benzene sulfonamides incorporating thio, sulfinyl and sulfonyl glycoside moieties. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 2273-2276.	2.2	38
733	Inhibition of the R1 fragment of the cadmium-containing ζ-class carbonic anhydrase from the diatom Thalassiosira weissflogii with anions. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 4745-4748.	2.2	38
734	Promiscuity of Carbonic Anhydrase II. Unexpected Ester Hydrolysis of Carbohydrate-Based Sulfamate Inhibitors. Journal of the American Chemical Society, 2011, 133, 18452-18462.	13.7	38
735	Heavy metal ion inhibition studies of human, sheep and fish α-carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 278-282.	5.2	38
736	Kinetic and anion inhibition studies of a β-carbonic anhydrase (FbiCA 1) from the C4 plant Flaveria bidentis. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 1626-1630.	2.2	38
737	Selective inhibition of human carbonic anhydrases by novel amide derivatives of probenecid: Synthesis, biological evaluation and molecular modelling studies. Bioorganic and Medicinal Chemistry, 2014, 22, 3982-3988.	3.0	38
738	Plasmonic Particles that Hit Hypoxic Cells. Advanced Functional Materials, 2015, 25, 316-323.	14.9	38

#	Article	IF	CITATIONS
739	Carbonic anhydrase inhibition and cytotoxicity studies of Mannich base derivatives of thymol. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1375-1380.	5.2	38
740	Designing, synthesis and bioactivities of 4-[3-(4-hydroxyphenyl)-5-aryl-4,5-dihydro-pyrazol-1-yl]benzenesulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 169-175.	5.2	38
741	Structure–Activity Relationships of Benzenesulfonamideâ€Based Inhibitors towards Carbonic Anhydrase Isoform Specificity. ChemBioChem, 2017, 18, 213-222.	2.6	38
742	Antileishmanial activity of sulphonamide nanoemulsions targeting the β -carbonic anhydrase from <i>Leishmania</i> species. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 850-857.	5.2	38
743	Continued exploration and tail approach synthesis of benzenesulfonamides containing triazole and dual triazole moieties as carbonic anhydrase I, II, IV and IX inhibitors. European Journal of Medicinal Chemistry, 2019, 183, 111698.	5.5	38
744	Synthesis and biological evaluation of coumarin-1,3,4-oxadiazole hybrids as selective carbonic anhydrase IX and XII inhibitors. Bioorganic Chemistry, 2019, 87, 765-772.	4.1	38
745	Identification and characterization of the α-CA in the outer membrane vesicles produced by <i>Helicobacter pylori</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 189-195.	5.2	38
746	Synthesis, biological and molecular dynamics investigations with a series of triazolopyrimidine/triazole-based benzenesulfonamides as novel carbonic anhydrase inhibitors. European Journal of Medicinal Chemistry, 2020, 185, 111843.	5.5	38
747	Design, synthesis and molecular modelling studies of some pyrazole derivatives as carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 289-297.	5.2	38
748	Carbonic Anhydrases: Versatile and Useful Biocatalysts in Chemistry and Biochemistry. Catalysts, 2020, 10, 1008.	3.5	38
749	Novel 3-substituted coumarins as selective human carbonic anhydrase IX and XII inhibitors: Synthesis, biological and molecular dynamics analysis. European Journal of Medicinal Chemistry, 2021, 209, 112897.	5.5	38
750	Development of novel benzofuran-based SLC-0111 analogs as selective cancer-associated carbonic anhydrase isoform IX inhibitors. European Journal of Medicinal Chemistry, 2021, 216, 113283.	5.5	38
751	Sulfenamido-Sulfonamides as Inhibitors of Carbonic Anhydrase Isozymes I, II And IV. Journal of Enzyme Inhibition and Medicinal Chemistry, 1997, 12, 175-190.	0.5	37
752	QSAR study on carbonic anhydrase inhibitors: aromatic/heterocyclic sulfonamides containing 8-quinoline-sulfonyl moieties, with topical activity as antiglaucoma agents. European Journal of Medicinal Chemistry, 2004, 39, 593-600.	5.5	37
753	Molecular modeling study for the binding of zonisamide and topiramate to the human mitochondrial carbonic anhydrase isoform VA. Bioorganic and Medicinal Chemistry, 2007, 15, 4152-4158.	3.0	37
754	Carbonic anhydrase inhibitors. Interaction of the antiepileptic drug sulthiame with twelve mammalian isoforms: Kinetic and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 4866-4872.	2.2	37
755	Carbonic anhydrase inhibitors: Thioxolone versus sulfonamides for obtaining isozyme-selective inhibitors?. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 3938-3941.	2.2	37
756	Carbonic anhydrase inhibitors: Copper(II) complexes of polyamino-polycarboxylamido aromatic/heterocyclic sulfonamides are very potent inhibitors of the tumor-associated isoforms IX and XII. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 836-841.	2.2	37

#	Article	IF	CITATIONS
757	Dual Inhibitors for Aspartic Proteases HIV-1 PR and Renin: Advancements in AIDS–Hypertension–Diabetes Linkage via Molecular Dynamics, Inhibition Assays, and Binding Free Energy Calculations. Journal of Medicinal Chemistry, 2012, 55, 5784-5796.	6.4	37
758	Inhibition of carbonic anhydrase isozymes I and II with natural products extracted from plants, mushrooms and honey. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 395-402.	5.2	37
759	Carbonic anhydrase inhibitors. Synthesis of heterocyclic 4-substituted pyridine-3-sulfonamide derivatives and their inhibition of the human cytosolic isozymes I and II and transmembrane tumor-associated isozymes IX and XII. European Journal of Medicinal Chemistry, 2013, 69, 701-710.	5.5	37
760	Carbonic anhydrase inhibitors: Synthesis and inhibition of the human carbonic anhydrase isoforms I, II, IX and XII with benzene sulfonamides incorporating 4- and 3-nitrophthalimide moieties. Bioorganic and Medicinal Chemistry, 2014, 22, 1586-1595.	3.0	37
761	Exploring carbonic anhydrase inhibition with multimeric coumarins displayed on a fullerene scaffold. Organic and Biomolecular Chemistry, 2015, 13, 7445-7451.	2.8	37
762	Synthesis of Schiff base derivatives of 4-(2-aminoethyl)-benzenesulfonamide with inhibitory activity against carbonic anhydrase isoforms I, II, IX and XII. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 2377-2381.	2.2	37
763	Cloning, expression, purification and sulfonamide inhibition profile of the complete domain of the Îcarbonic anhydrase from Plasmodium falciparum. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 4184-4190.	2.2	37
764	Pyridazinone substituted benzenesulfonamides as potent carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 1337-1341.	2.2	37
765	Inhibition studies on a panel of human carbonic anhydrases with <i>N</i> 1-substituted secondary sulfonamides incorporating thiazolinone or imidazolone-indole tails. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 629-638.	5.2	37
766	Blocking HIF signaling via novel inhibitors of CA9 and APE1/Ref-1 dramatically affects pancreatic cancer cell survival. Scientific Reports, 2018, 8, 13759.	3.3	37
767	Novel carbonic anhydrase inhibitors. Future Medicinal Chemistry, 2021, 13, 1935-1937.	2.3	37
768	Carbonic anhydrase inhibitors: synthesis of N -morpholyl-thiocarbonylsulfenylamino aromatic/heterocyclic sulfonamides and their interaction with isozymes I, II and IV. Bioorganic and Medicinal Chemistry Letters, 2000, 10, 1117-1120.	2.2	36
769	Protease Inhibitors:Â Synthesis of a Series of Bacterial Collagenase Inhibitors of the Sulfonyl Amino Acyl Hydroxamate Type. Journal of Medicinal Chemistry, 2001, 44, 2253-2258.	6.4	36
770	Carbonic anhydrase inhibitors: X-ray crystallographic structure of the adduct of human isozyme II with a bis-sulfonamide—two heads are better than one?. Bioorganic and Medicinal Chemistry Letters, 2003, 13, 2759-2763.	2.2	36
771	Benzolamide is not a Membrane-impermeant Carbonic Anhydrase Inhibitor. Journal of Enzyme Inhibition and Medicinal Chemistry, 2004, 19, 269-273.	5.2	36
772	Carbonic anhydrase activators: Activation of the archaeal β-class (Cab) and γ-class (Cam) carbonic anhydrases with amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 6194-6198.	2.2	36
773	Carbonic anhydrase inhibitors. Cloning, characterization and inhibition studies of the cytosolic isozyme III with anions. Journal of Enzyme Inhibition and Medicinal Chemistry, 2009, 24, 70-76.	5.2	36
774	Structural Basis for the Interaction Between Carbonic Anhydrase and 1,2,3,4-tetrahydroisoquinolin-2-ylsulfonamides. Journal of Medicinal Chemistry, 2011, 54, 2522-2526.	6.4	36

#	Article	IF	CITATIONS
775	Pyrazolo[4,3-e][1,2,4]triazine sulfonamides as carbonic anhydrase inhibitors with antitumor activity. Bioorganic and Medicinal Chemistry, 2014, 22, 2643-2647.	3.0	36
776	New pyrazolo[4,3-e][1,2,4]triazine sulfonamides as carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry, 2015, 23, 3674-3680.	3.0	36
777	α-Carbonic Anhydrases Possess Thioesterase Activity. ACS Medicinal Chemistry Letters, 2015, 6, 292-295.	2.8	36
778	Inâ€Vivo Evaluation of Selective Carbonic Anhydrase Inhibitors as Potential Anticonvulsant Agents. ChemMedChem, 2016, 11, 1812-1818.	3.2	36
779	The inhibitory effects of phenolic Mannich bases on carbonic anhydrase I and II isoenzymes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1678-1681.	5.2	36
780	Carbonic anhydrase inhibitory properties of some uracil derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 74-77.	5.2	36
781	Coumarins and other fused bicyclic heterocycles with selective tumor-associated carbonic anhydrase isoforms inhibitory activity. Bioorganic and Medicinal Chemistry, 2017, 25, 677-683.	3.0	36
782	β-CA-specific inhibitor dithiocarbamate Fc14–584B: a novel antimycobacterial agent with potential to treat drug-resistant tuberculosis. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 832-840.	5.2	36
783	Benzenesulfonamide bearing imidazothiadiazole and thiazolotriazole scaffolds as potent tumor associated human carbonic anhydrase IX and XII inhibitors. Bioorganic and Medicinal Chemistry, 2017, 25, 1286-1293.	3.0	36
784	Sulfocoumarinâ€, Coumarinâ€, 4â€Sulfamoylphenylâ€Bearing Indazoleâ€3â€carboxamide Hybrids: Synthesis and Selective Inhibition of Tumorâ€Associated Carbonic Anhydrase Isozymes IX and XII. ChemMedChem, 2017, 12, 1578-1584.	3.2	36
785	Synthesis of novel isoindoline-1,3-dione-based oximes and benzenesulfonamide hydrazones as selective inhibitors of the tumor-associated carbonic anhydrase IX. Bioorganic Chemistry, 2018, 80, 706-713.	4.1	36
786	Synthesis of benzensulfonamides linked to quinazoline scaffolds as novel carbonic anhydrase inhibitors. Bioorganic Chemistry, 2019, 87, 78-90.	4.1	36
787	Synthesis of novel benzenesulfonamide bearing 1,2,3-triazole linked hydroxy-trifluoromethylpyrazolines and hydrazones as selective carbonic anhydrase isoforms IX and XII inhibitors. Bioorganic Chemistry, 2019, 85, 198-208.	4.1	36
788	Deciphering the key heterocyclic scaffolds in targeting microtubules, kinases and carbonic anhydrases for cancer drug development. , 2021, 225, 107860.		36
789	Inhibition of Carbonic Anhydrase IX: A New Strategy Against Cancer. Anti-Cancer Agents in Medicinal Chemistry, 2009, 9, 693-702.	1.7	36
790	A decade of tail-approach based design of selective as well as potent tumor associated carbonic anhydrase inhibitors. Bioorganic Chemistry, 2022, 126, 105920.	4.1	36
791	Novel carbonic anhydrase isozymes I, II and IV activators incorporating sulfonyl-histamino moieties. Bioorganic and Medicinal Chemistry Letters, 1999, 9, 2043-2048.	2.2	35
792	3D QSAR Selectivity Analyses of Carbonic Anhydrase Inhibitors:  Insights for the Design of Isozyme Selective Inhibitors. Journal of Chemical Information and Modeling, 2006, 46, 2737-2760.	5.4	35

#	Article	IF	CITATIONS
793	N-Hydroxyurea—A versatile zinc binding function in the design of metalloenzyme inhibitors. Bioorganic and Medicinal Chemistry Letters, 2006, 16, 4316-4320.	2.2	35
794	Carbonic anhydrase inhibitors. Inhibition of transmembrane isozymes XII (cancer-associated) and XIV with anions. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 1532-1537.	2.2	35
795	Carbonic anhydrase inhibitors: The X-ray crystal structure of ethoxzolamide complexed to human isoform II reveals the importance of thr200 and gln92 for obtaining tight-binding inhibitors. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 2669-2674.	2.2	35
796	Carbonic anhydrase inhibitors. Inhibition of cytosolic isoforms I, II, III, VII and XIII with less investigated inorganic anions. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 1855-1857.	2.2	35
797	Tricyclic Sulfonamides Incorporating Benzothiopyrano[4,3-c]pyrazole and Pyridothiopyrano[4,3-c]pyrazole Effectively Inhibit α- and β-Carbonic Anhydrase: X-ray Crystallography and Solution Investigations on 15 Isoforms. Journal of Medicinal Chemistry, 2012, 55, 9619-9629.	6.4	35
798	Inhibition of α-class cytosolic human carbonic anhydrases I, II, IX and XII, and β-class fungal enzymes by carboxylic acids and their derivatives: New isoform-I selective nanomolar inhibitors. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 5801-5806.	2.2	35
799	Purification and characterization of carbonic anhydrase from sheep kidney and effects of sulfonamides on enzyme activity. Bioorganic and Medicinal Chemistry, 2013, 21, 1522-1525.	3.0	35
800	Kinetic study of a novel thermo-stable α-carbonic anhydrase for biomimetic CO2 capture. Enzyme and Microbial Technology, 2013, 53, 271-277.	3.2	35
801	Nitric Oxide Donors and Selective Carbonic Anhydrase Inhibitors: A Dual Pharmacological Approach for the Treatment of Glaucoma, Cancer and Osteoporosis. Molecules, 2015, 20, 5667-5679.	3.8	35
802	Design and synthesis of benzothiazole-6-sulfonamides acting as highly potent inhibitors of carbonic anhydrase isoforms I, II, IX and XII. Bioorganic and Medicinal Chemistry, 2015, 23, 4989-4999.	3.0	35
803	New approaches to the synthesis of sildenafil analogues and their enzyme inhibitory activity. Bioorganic and Medicinal Chemistry, 2015, 23, 1421-1429.	3.0	35
804	Inhibition of carbonic anhydrase isoforms I, II, IV, VII and XII with carboxylates and sulfonamides incorporating phthalimide/phthalic anhydride scaffolds. Bioorganic and Medicinal Chemistry, 2016, 24, 20-25.	3.0	35
805	Synthesis of bulky-tailed sulfonamides incorporating pyrido[2,3- d][1,2,4]triazolo[4,3- a effects. Bioorganic and Medicinal Chemistry, 2017, 25, 2210-2217.	3.0	35
806	Inhibition of the α-carbonic anhydrase from <i>Vibrio cholerae</i> with amides and sulfonamides incorporating imidazole moieties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 798-804.	5.2	35
807	Insights into the role of reactive sulfhydryl groups of Carbonic Anhydrase III and VII during oxidative damage. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 5-12.	5.2	35
808	Synthesis of different thio-scaffolds bearing sulfonamide with subnanomolar carbonic anhydrase II and IX inhibitory properties and X-ray investigations for their inhibitory mechanism. Bioorganic Chemistry, 2018, 81, 642-648.	4.1	35
809	Novel approaches for designing drugs that interfere with pH regulation. Expert Opinion on Drug Discovery, 2019, 14, 231-248.	5.0	35
810	Selective Inhibition of Helicobacter pylori Carbonic Anhydrases by Carvacrol and Thymol Could Impair Biofilm Production and the Release of Outer Membrane Vesicles. International Journal of Molecular Sciences, 2021, 22, 11583.	4.1	35

#	Article	IF	CITATIONS
811	Carbonic anhydrase activators. European Journal of Pharmaceutical Sciences, 2000, 10, 29-41.	4.0	34
812	Carbonic anhydrase inhibitors: Inhibition of cytosolic/tumor-associated carbonic anhydrase isozymes I, II, and IX with benzo[b]thiophene 1,1-dioxide sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 4872-4876.	2.2	34
813	A perspective on quantitative structure–activity relationships and carbonic anhydrase inhibitors. Expert Opinion on Drug Metabolism and Toxicology, 2006, 2, 113-137.	3.3	34
814	Carbonic anhydrase inhibitors. Phenacetyl-, pyridylacetyl- and thienylacetyl-substituted aromatic sulfonamides act as potent and selective isoform VII inhibitors. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 3170-3173.	2.2	34
815	Design, Synthesis, and Biological Evaluation of Novel Carbohydrate-Based Sulfamates as Carbonic Anhydrase Inhibitors. Journal of Medicinal Chemistry, 2011, 54, 1481-1489.	6.4	34
816	Sulfonamide inhibition study of the carbonic anhydrases from the bacterial pathogen Porphyromonas gingivalis: The β-class (PgiCAb) versus the γ-class (PgiCA) enzymes. Bioorganic and Medicinal Chemistry, 2014, 22, 4537-4543.	3.0	34
817	Pyrazolylbenzo[d]imidazoles as new potent and selective inhibitors of carbonic anhydrase isoforms hCA IX and XII. Bioorganic and Medicinal Chemistry, 2016, 24, 2907-2913.	3.0	34
818	Anion inhibition profiles of the complete domain of the Î-carbonic anhydrase from Plasmodium falciparum. Bioorganic and Medicinal Chemistry, 2016, 24, 4410-4414.	3.0	34
819	Inhibition of carbonic anhydrase from <i>Trypanosoma cruzi</i> for the management of Chagas disease: an underexplored therapeutic opportunity. Future Medicinal Chemistry, 2016, 8, 311-324.	2.3	34
820	A class of carbonic anhydrase I – selective activators. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 37-46.	5.2	34
821	Synthesis and biological evaluation of novel N,N′-diaryl cyanoguanidines acting as potent and selective carbonic anhydrase II inhibitors. Bioorganic Chemistry, 2018, 77, 245-251.	4.1	34
822	Synthesis, biological evaluation and in silico modelling studies of 1,3,5-trisubstituted pyrazoles carrying benzenesulfonamide as potential anticancer agents and selective cancer-associated hCA IX isoenzyme inhibitors. Bioorganic Chemistry, 2019, 92, 103222.	4.1	34
823	Synthesis and carbonic anhydrase inhibition studies of sulfonamide based indole-1,2,3-triazole chalcone hybrids. Bioorganic Chemistry, 2020, 99, 103839.	4.1	34
824	Carbonic Anhydrase Inhibitors: Synthesis of Water Soluble Sulfonamides Incorporating a 4-sulfamoylphenylmethylthiourea Scaffold, with Potent Intraocular Pressure Lowering Properties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2002, 17, 333-343.	5.2	33
825	Protein tyrosine kinase inhibitors as anticancer agents. Expert Opinion on Therapeutic Patents, 2004, 14, 35-53.	5.0	33
826	Carbonic anhydrase inhibitors. Inhibition studies of the human secretory isoform VI with anions. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 1037-1042.	2.2	33
827	External pH influences the transcriptional profile of the carbonic anhydrase, CAH-4b in Caenorhabditis elegans. Molecular and Biochemical Parasitology, 2008, 161, 140-149.	1.1	33
828	Novel organometallic cationic ruthenium(II) pentamethylcyclopentadienyl benzenesulfonamide complexes targeted to inhibit carbonic anhydrase. Journal of Biological Inorganic Chemistry, 2009, 14, 935-945.	2.6	33

#	Article	IF	CITATIONS
829	Carbonic anhydrase inhibitors. Inhibition of the β-class enzymes from the fungal pathogens Candida albicans and Cryptococcus neoformans with branched aliphatic/aromatic carboxylates and their derivatives. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 2521-2526.	2.2	33
830	N-β-Glycosyl sulfamides are selective inhibitors of the cancer associated carbonic anhydrase isoforms IX and XII. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 4447-4450.	2.2	33
831	Effects of dopaminergic compounds on carbonic anhydrase isozymes I, II, and VI. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 365-369.	5.2	33
832	Synthesis of novel acridine and bis acridine sulfonamides with effective inhibitory activity against the cytosolic carbonic anhydrase isoforms II and VII. Bioorganic and Medicinal Chemistry, 2013, 21, 5799-5805.	3.0	33
833	Inhibition of mammalian carbonic anhydrases I-XIV with grayanotoxin III: solution and in silico studies. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 469-475.	5.2	33
834	Sulfonamide inhibition studies of the γ-carbonic anhydrase from the Antarctic cyanobacterium Nostoc commune. Bioorganic and Medicinal Chemistry, 2015, 23, 1728-1734.	3.0	33
835	Synthesis and in Vivo Biological Evaluation of ⁶⁸ Ga-Labeled Carbonic Anhydrase IX Targeting Small Molecules for Positron Emission Tomography. Journal of Medicinal Chemistry, 2016, 59, 6431-6443.	6.4	33
836	Synthesis of 4-sulfamoylphenyl-benzylamine derivatives with inhibitory activity against human carbonic anhydrase isoforms I, II, IX and XII. Bioorganic and Medicinal Chemistry, 2016, 24, 982-988.	3.0	33
837	4-Arylbenzenesulfonamides as Human Carbonic Anhydrase Inhibitors (hCAIs): Synthesis by Pd Nanocatalyst-Mediated Suzuki–Miyaura Reaction, Enzyme Inhibition, and X-ray Crystallographic Studies. Journal of Medicinal Chemistry, 2016, 59, 721-732.	6.4	33
838	Synthesis and biological evaluation of cyclic imides incorporating benzenesulfonamide moieties as carbonic anhydrase I, II, IV and IX inhibitors. Bioorganic and Medicinal Chemistry, 2017, 25, 1666-1671.	3.0	33
839	<i>Brucella suis</i> carbonic anhydrases and their inhibitors: Towards alternative antibiotics?. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 683-687.	5.2	33
840	Psychoactive substances belonging to the amphetamine class potently activate brain carbonic anhydrase isoforms VA, VB, VII, and XII. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1253-1259.	5.2	33
841	Inhibition of the β-carbonic anhydrase from the dandruff-producing fungus <i>Malassezia globosa</i> with monothiocarbamates. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1064-1070.	5.2	33
842	Carbonic anhydrase inhibitors based on sorafenib scaffold: Design, synthesis, crystallographic investigation and effects on primary breast cancer cells. European Journal of Medicinal Chemistry, 2019, 182, 111600.	5.5	33
843	The role of carbonic anhydrases in extinction of contextual fear memory. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 16000-16008.	7.1	33
844	Discovery of Potent Dual-Tailed Benzenesulfonamide Inhibitors of Human Carbonic Anhydrases Implicated in Glaucoma and in Vivo Profiling of Their Intraocular Pressure-Lowering Action. Journal of Medicinal Chemistry, 2020, 63, 3317-3326.	6.4	33
845	1,2,4-Triazole-based anticonvulsant agents with additional ROS scavenging activity are effective in a model of pharmacoresistant epilepsy. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 993-1002.	5.2	33
846	Carbonic Anhydrase Inhibitors. Schiff Bases of some Aromatic Sulfonamides and Their Metal Complexes: Towards More Selective Inhibitors of Carbonic Anhydrase Isozyme IV. Journal of Enzyme Inhibition and Medicinal Chemistry, 1999, 14, 407-423.	0.5	32

#	Article	IF	CITATIONS
847	Carbonic anhydrase activators – Part 21. Novel activators of isozymes I, II and IV incorporating carboxamido and ureido histamine moieties. European Journal of Medicinal Chemistry, 2000, 35, 31-39.	5.5	32
848	Carbonic Anhydrase Inhibitors: Inhibition of Isozymes I, II and IV by Sulfamide and Sulfamic Acid Derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2000, 15, 443-453.	0.5	32
849	Carbonic anhydrase inhibitors: X-ray crystallographic studies for the binding of 5-amino-1,3,4-thiadiazole-2-sulfonamide and 5-(4-amino-3-chloro-5-fluorophenylsulfonamido)-1,3,4-thiadiazole-2-sulfonamide to human isoform II. Bioorganic and Medicinal Chemistry Letters. 2006. 16. 6204-6208.	2.2	32
850	Synthesis and evaluation of pharmacological profile of 1-aryl-6,7-dimethoxy-3,4-dihydroisoquinoline-2(1H)-sulfonamides. Bioorganic and Medicinal Chemistry, 2009, 17, 3659-3664.	3.0	32
851	Recent Advances in Structural Studies of the Carbonic Anhydrase Family: The Crystal Structure of Human CA IX and CA XIII. Current Pharmaceutical Design, 2010, 16, 3246-3254.	1.9	32
852	Novel small molecule protein arginine deiminase 4 (PAD4) inhibitors. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 715-719.	2.2	32
853	Furazan and furoxan sulfonamides are strong α-carbonic anhydrase inhibitors and potential antiglaucoma agents. Bioorganic and Medicinal Chemistry, 2014, 22, 3913-3921.	3.0	32
854	New amide derivatives of Probenecid as selective inhibitors of carbonic anhydrase IX and XII: Biological evaluation and molecular modelling studies. Bioorganic and Medicinal Chemistry, 2015, 23, 2975-2981.	3.0	32
855	New series of sulfonamides containing amino acid moiety act as effective and selective inhibitors of tumor-associated carbonic anhydrase XII. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 430-434.	5.2	32
856	9,10â€Dibromoâ€ <i>N</i> â€arylâ€9,10â€dihydroâ€9,10â€[3,4]epipyrroloanthraceneâ€12,14â€diones: Synthesi Investigation of Their Effects on Carbonic Anhydrase Isozymes I, II, IX, and XII. Archiv Der Pharmazie, 2016, 349, 466-474.	s and 4.1	32
857	Natural Polyphenols Selectively Inhibit βâ€Carbonic Anhydrase from the Dandruffâ€Producing Fungus <i>Malassezia globosa</i> : Activity and Modeling Studies. ChemMedChem, 2018, 13, 816-823.	3.2	32
858	Selective inhibition of carbonic anhydrase IX over carbonic anhydrase XII in breast cancer cells using benzene sulfonamides: Disconnect between activity and growth inhibition. PLoS ONE, 2018, 13, e0207417.	2.5	32
859	Discovery of new 2, 5-disubstituted 1,3-selenazoles as selective human carbonic anhydrase IX inhibitors with potent anti-tumor activity. European Journal of Medicinal Chemistry, 2018, 157, 1214-1222.	5.5	32
860	Rho-kinase inhibitors in the management of glaucoma. Expert Opinion on Therapeutic Patents, 2019, 29, 817-827.	5.0	32
861	An update on drug interaction considerations in the therapeutic use of carbonic anhydrase inhibitors. Expert Opinion on Drug Metabolism and Toxicology, 2020, 16, 297-307.	3.3	32
862	Sulfocoumarins as dual inhibitors of human carbonic anhydrase isoforms IX/XII and of human thioredoxin reductase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 506-510.	5.2	32
863	Multitargeting approaches involving carbonic anhydrase inhibitors: hybrid drugs against a variety of disorders. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1702-1714.	5.2	32
864	Carbonic Anhydrase Inhibitors. Water-Soluble, Topically Effective Intraocular Pressure Lowering Agents Derived from Isonicotinic Acid and Aromatic/Heterocyclic Sulfonamides: Is the Tail More Important than the Ring?. Journal of Enzyme Inhibition and Medicinal Chemistry, 1999, 14, 457-474.	0.5	31

#	Article	IF	CITATIONS
865	Protease inhibitors: Synthesis of matrix metalloproteinase and bacterial collagenase inhibitors incorporating 5-amino-2-mercapto-1,3,4-thiadiazole zinc binding functions. Bioorganic and Medicinal Chemistry Letters, 2002, 12, 2667-2672.	2.2	31
866	Carbonic anhydrase inhibitors: Topically acting antiglaucoma sulfonamides incorporating esters and amides of 3- and 4-carboxybenzolamide. Bioorganic and Medicinal Chemistry Letters, 2003, 13, 2867-2873.	2.2	31
867	Therapeutic applications of sulfamates. Expert Opinion on Therapeutic Patents, 2004, 14, 1273-1308.	5.0	31
868	Carbonic anhydrase inhibitors. Inhibition of isozymes I, II, IV, V, and IX with anions isosteric and isoelectronic with sulfate, nitrate, and carbonate. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 567-571.	2.2	31
869	Carbonic anhydrase inhibitors: Inhibition studies of a coral secretory isoform with inorganic anions. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 650-653.	2.2	31
870	An inhibitor-like binding mode of a carbonic anhydrase activator within the active site of isoform II. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 2764-2768.	2.2	31
871	5-Substituted-(1,2,3-triazol-4-yl)thiophene-2-sulfonamides strongly inhibit human carbonic anhydrases I, II, IX and XII: Solution and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry, 2013, 21, 5130-5138.	3.0	31
872	Metalloenzyme inhibitors for the treatment of Gram-negative bacterial infections: a patent review (2009 – 2012). Expert Opinion on Therapeutic Patents, 2013, 23, 777-788.	5.0	31
873	Eriocitrin and Apigenin as New Carbonic Anhydrase VA Inhibitors from a Virtual Screening of Calabrian Natural Products. Planta Medica, 2015, 81, 533-540.	1.3	31
874	Sulfonamide inhibition study of the β-class carbonic anhydrase from the caries producing pathogen Streptococcus mutans. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 2291-2297.	2.2	31
875	Fluorinated pyrrolidines and piperidines incorporating tertiary benzenesulfonamide moieties are selective carbonic anhydrase II inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 737-745.	5.2	31
876	Poly(amidoamine) Dendrimers with Carbonic Anhydrase Inhibitory Activity and Antiglaucoma Action. Journal of Medicinal Chemistry, 2015, 58, 4039-4045.	6.4	31
877	Active Components of Essential Oils as Anti-Obesity Potential Drugs Investigated by in Silico Techniques. Journal of Agricultural and Food Chemistry, 2016, 64, 5295-5300.	5.2	31
878	The management of glaucoma and macular degeneration. Expert Opinion on Therapeutic Patents, 2019, 29, 745-747.	5.0	31
879	Design, synthesis, and carbonic anhydrase inhibition activity of benzenesulfonamide-linked novel pyrazoline derivatives. Bioorganic Chemistry, 2019, 87, 425-431.	4.1	31
880	Exploring structural properties of potent human carbonic anhydrase inhibitors bearing a 4-(cycloalkylamino-1-carbonyl)benzenesulfonamide moiety. European Journal of Medicinal Chemistry, 2019, 163, 443-452.	5.5	31
881	4-Toluenesulfonylureido derivatives of amines, amino acids and dipeptides: a novel class of potential antitumor agents. European Journal of Pharmaceutical Sciences, 2000, 11, 325-332.	4.0	30
882	Carbonic Anhydrase Activators: Synthesis of High Affinity Isozymes I, II and IV Activators, Derivatives of 4-(4-Tosylureido-Amino Acyl)Ethyl-1 <i>H</i> Imidazole (Histamine Derivatives). Journal of Enzyme Inhibition and Medicinal Chemistry, 2000, 15, 139-161.	0.5	30

#	Article	IF	CITATIONS
883	Topological modeling of lipophilicity, diuretic activity, and carbonic inhibition activity of benzene sulfonamides: a molecular connectivity approach. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 5661-5666.	2.2	30
884	Carbonic anhydrase activators: Activation of the human cytosolic isozyme III and membrane-associated isoform IV with amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 4303-4307.	2.2	30
885	Intact intracellular tail is critical for proper functioning of the tumorâ€associated, hypoxiaâ€regulated carbonic anhydrase IX. FEBS Letters, 2009, 583, 3563-3568.	2.8	30
886	Carbonic anhydrase inhibitors. Inhibition studies of a coral secretory isoform by sulfonamides. Bioorganic and Medicinal Chemistry, 2009, 17, 5054-5058.	3.0	30
887	Expression of CAâ€IX is associated with advanced stage tumors and poor survival in oral squamous cell carcinoma patients. Journal of Oral Pathology and Medicine, 2012, 41, 667-674.	2.7	30
888	Human carbonic anhydrase VII protects cells from oxidative damage. Biological Chemistry, 2013, 394, 1343-1348.	2.5	30
889	Synthesis of sulfonamide conjugates of Cu(<scp>ii</scp>), Ga(<scp>iii</scp>), In(<scp>iii</scp>), Re(<scp>v</scp>) and Zn(<scp>ii</scp>) complexes: carbonic anhydrase inhibition studies and cellular imaging investigations. Dalton Transactions, 2015, 44, 4859-4873.	3.3	30
890	A new procedure for the cloning, expression and purification of the β-carbonic anhydrase from the pathogenic yeast <i>Malassezia globosa</i> , an anti-dandruff drug target. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1156-1161.	5.2	30
891	Activation of β- and γ-carbonic anhydrases from pathogenic bacteria with tripeptides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 945-950.	5.2	30
892	Intermolecular amination of allylic and benzylic alcohols leads to effective inhibitions of acetylcholinesterase enzyme and carbonic anhydrase I and II isoenzymes. Journal of Biochemical and Molecular Toxicology, 2018, 32, e22173.	3.0	30
893	Crystal structure and chemical inhibition of essential schistosome host-interactive virulence factor carbonic anhydrase SmCA. Communications Biology, 2019, 2, 333.	4.4	30
894	Dual P-Glycoprotein and CA XII Inhibitors: A New Strategy to Reverse the P-gp Mediated Multidrug Resistance (MDR) in Cancer Cells. Molecules, 2020, 25, 1748.	3.8	30
895	Comprehensive study on potent and selective carbonic anhydrase inhibitors: Synthesis, bioactivities and molecular modelling studies of 4-(3-(2-arylidenehydrazine-1-carbonyl)-5-(thiophen-2-yl)-1H-pyrazole-1-yl) benzenesulfonamides. European lournal of Medicinal Chemistry. 2021, 217, 113351.	5.5	30
896	Carbonic Anhydrase Activators. VII. Isozyme II Activation by Bisazolyl-methanes, -ethanes and Related Azoles Biological and Pharmaceutical Bulletin, 1993, 16, 1236-1239.	1.4	29
897	Carbonic Anhydrase Inhibitors: Ureido and Thioureido Derivatives of Aromatic Sulfonamides Possessing Increased Affinities for Isozyme I. A Novel Route To 2,5-Disubstituted-L,3,4-Thiadiazoles Via Thioureas, and Their Interaction with Isozymes I, II and IV. Journal of Enzyme Inhibition and Medicinal Chemistry. 1998. 13. 103-123.	0.5	29
898	Protease inhibitors: synthesis of Clostridium histolyticum collagenase inhibitors incorporating sulfonyl-l-alanine hydroxamate moieties. Bioorganic and Medicinal Chemistry Letters, 2000, 10, 499-502.	2.2	29
899	Carbonic anhydrase inhibitors. Design of anticonvulsant sulfonamides incorporating indane moieties. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 5781-5786.	2.2	29
900	Carbonic anhydrase inhibitors. Inhibition of the membrane-bound human and bovine isozymes IV with sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 1149-1154.	2.2	29

#	Article	IF	CITATIONS
901	Characterization and Inhibition of the Recently Discovered Carbonic Anhydrase Isoforms CA XIII, XIV and XV. Current Topics in Medicinal Chemistry, 2007, 7, 893-899.	2.1	29
902	Therapeutic applications of the carbonic anhydrase inhibitors. Therapy: Open Access in Clinical Medicine, 2007, 4, 355-378.	0.2	29
903	Carbonic anhydrase inhibitors: Inhibition of cytosolic/tumor-associated isoforms I, II, and IX with iminodiacetic carboxylates/hydroxamates also incorporating benzenesulfonamide moieties. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 1538-1543.	2.2	29
904	Carbonic anhydrase inhibitors: Inhibition of human cytosolic isozymes I and II and tumor-associated isozymes IX and XII with S-substituted 4-chloro-2-mercapto-5-methyl-benzenesulfonamides. Bioorganic and Medicinal Chemistry, 2008, 16, 3933-3940.	3.0	29
905	Carbonic anhydrase inhibitors. Inhibition of the human cytosolic isoforms I and II and transmembrane, tumor-associated isoforms IX and XII with boronic acids. Bioorganic and Medicinal Chemistry, 2009, 17, 3649-3652.	3.0	29
906	Carbonic anhydrase inhibitors. Inhibition of the Rv1284 and Rv3273 Î ² -carbonic anhydrases from Mycobacterium tuberculosis with diazenylbenzenesulfonamides. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 4929-4932.	2.2	29
907	Analysis of a shortened form of human carbonic anhydrase VII expressed in vitro compared to the full-length enzyme. Biochimie, 2010, 92, 1072-1080.	2.6	29
908	Pyridinium derivatives of histamine are potent activators of cytosolic carbonic anhydrase isoforms I, II and VII. Organic and Biomolecular Chemistry, 2011, 9, 2790.	2.8	29
909	Inhibition of beta-carbonic anhydrases from the bacterial pathogen Brucella suis with inorganic anions. Journal of Inorganic Biochemistry, 2012, 110, 36-39.	3.5	29
910	Facilitation by intracellular carbonic anhydrase of Na ⁺ –HCO ₃ ^{â^'} coâ€ŧransport but not Na ⁺ /H ⁺ exchange activity in the mammalian ventricular myocyte. Journal of Physiology, 2014, 592, 991-1007.	2.9	29
911	Dipotassium-trioxohydroxytetrafluorotriborate, K ₂ [B ₃ O ₃ F ₄ OH], is a potent inhibitor of human carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 341-344.	5.2	29
912	Inhibition studies of bacterial, fungal and protozoan β-class carbonic anhydrases with Schiff bases incorporating sulfonamide moieties. Bioorganic and Medicinal Chemistry, 2015, 23, 4181-4187.	3.0	29
913	Critical role for prokineticin 2 in CNS autoimmunity. Neurology: Neuroimmunology and NeuroInflammation, 2015, 2, e95.	6.0	29
914	Poly(amidoamine) dendrimers show carbonic anhydrase inhibitory activity against α-, β-, γ- and η-class enzymes. Bioorganic and Medicinal Chemistry, 2015, 23, 6794-6798.	3.0	29
915	Bortezomib inhibits bacterial and fungal β-carbonic anhydrases. Bioorganic and Medicinal Chemistry, 2016, 24, 4406-4409.	3.0	29
916	Sources of protons and a role for bicarbonate in inhibitory feedback from horizontal cells to cones in <i>Ambystoma tigrinum</i> retina. Journal of Physiology, 2016, 594, 6661-6677.	2.9	29
917	Mycobacterial carbonic anhydrase inhibition with phenolic acids and esters: kinetic and computational investigations. Organic and Biomolecular Chemistry, 2016, 14, 8322-8330.	2.8	29
918	Targeting <i>Malassezia</i> species for Novel Synthetic and Natural Antidandruff Agents. Current Medicinal Chemistry, 2017, 24, 2392-2412.	2.4	29

#	Article	IF	CITATIONS
919	Comparison of the Sulfonamide Inhibition Profiles of the β- and γ-Carbonic Anhydrases from the Pathogenic Bacterium Burkholderia pseudomallei. Molecules, 2017, 22, 421.	3.8	29
920	2-Benzylpiperazine: A new scaffold for potent human carbonic anhydrase inhibitors. Synthesis, enzyme inhibition, enantioselectivity, computational and crystallographic studies and inÂvivo activity for a new class of intraocular pressure lowering agents. European Journal of Medicinal Chemistry, 2018, 151, 363-375.	5.5	29
921	Novel sulfonamide incorporating piperazine, aminoalcohol and 1,3,5-triazine structural motifs with carbonic anhydrase I, II and IX inhibitory action. Bioorganic Chemistry, 2018, 77, 25-37.	4.1	29
922	Design, synthesis and biological evaluation of coumarin-3-carboxamides as selective carbonic anhydrase IX and XII inhibitors. Bioorganic Chemistry, 2019, 86, 386-392.	4.1	29
923	Azidothymidine "Clicked―into 1,2,3-Triazoles: First Report on Carbonic Anhydrase–Telomerase Dual-Hybrid Inhibitors. Journal of Medicinal Chemistry, 2020, 63, 7392-7409.	6.4	29
924	A deadly spillover: SARS-CoV-2 outbreak. Expert Opinion on Therapeutic Patents, 2020, 30, 481-485.	5.0	29
925	Antibacterial activity of ethoxzolamide against Helicobacter pylori strains SS1 and 26695. Gut Pathogens, 2020, 12, 20.	3.4	29
926	Carbonic Anhydrase Inhibitors: Inhibition of Isozymes I, II and IV withN-Hydroxysulfonamides - A Novel Class of Intraocular Pressure Lowering Agents. Journal of Enzyme Inhibition and Medicinal Chemistry, 1998, 13, 267-284.	0.5	28
927	Carbonic anhydrase activators: amino acyl/dipeptidyl histamine derivatives bind with high affinity to isozymes I, II and IV and act as efficient activators. Bioorganic and Medicinal Chemistry, 1999, 7, 2915-2923.	3.0	28
928	Antifungal Activity of Ag(I) and Zn(Ii) Complexes of Aminobenzolamide (5-Sulfanilylamido-1,3,4-Thiadiazole-2-Sulfonamide) Derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2000, 15, 517-531.	0.5	28
929	Activation of carbonic anhydrase isozymes. , 2000, , 197-219.		28
930	Carbonic anhydrase inhibitors. Inhibition of the zinc and cobalt Î ³ -class enzyme from the archaeon Methanosarcina thermophila with anions. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 3327-3331.	2.2	28
931	Carbonic anhydrase inhibitors that directly inhibit anion transport by the human Clâ²'/HCO3â²'exchanger, AE1. Molecular Membrane Biology, 2004, 21, 423-433.	2.0	28
932	QSAR studies on benzene sulfonamide carbonic anhydrase inhibitors: need of hydrophobic parameter for topological modeling of binding constants of sulfonamides to human CA-II. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 923-930.	2.2	28
933	Carbonic anhydrase inhibitors: Design of thioureido sulfonamides with potent isozyme II and XII inhibitory properties and intraocular pressure lowering activity in a rabbit model of glaucoma. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 3821-3827.	2.2	28
934	Carbonic Anhydrase Inhibitors: Design of Membraneâ€Impermeant Copper(II) Complexes of DTPAâ€, DOTAâ€, and TETAâ€Tailed Sulfonamides Targeting the Tumorâ€Associated Transmembrane Isoform IX. ChemMedChem, 2008, 3, 1780-1788.	3.2	28
935	Carbonic anhydrase activators. The first activation study of a coral secretory isoform with amino acids and amines. Bioorganic and Medicinal Chemistry, 2010, 18, 2300-2303.	3.0	28
936	Carbonic anhydrase inhibitors. Inhibition studies with anions and sulfonamides of a new cytosolic enzyme from the scleractinian coral Stylophora pistillata. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 710-714.	2.2	28

#	Article	IF	CITATIONS
937	Design and synthesis of thiourea compounds that inhibit transmembrane anchored carbonic anhydrases. Bioorganic and Medicinal Chemistry, 2012, 20, 2392-2404.	3.0	28
938	Attachment of carbohydrates to methoxyaryl moieties leads to highly selective inhibitors of the cancer associated carbonic anhydrase isoforms IX and XII. Bioorganic and Medicinal Chemistry, 2014, 22, 5308-5314.	3.0	28
939	Anion inhibition study of the Î ² -class carbonic anhydrase (PgiCAb) from the oral pathogen Porphyromonas gingivalis. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 4402-4406.	2.2	28
940	Sulfonamide inhibition studies of the γ-carbonic anhydrase from the Antarctic bacterium Pseudoalteromonas haloplanktis. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 3550-3555.	2.2	28
941	Carbonic anhydrase IX inhibition is an effective strategy for osteosarcoma treatment. Expert Opinion on Therapeutic Targets, 2015, 19, 1593-1605.	3.4	28
942	Carbonic anhydrase activators: Activation of the β-carbonic anhydrase from Malassezia globosa with amines and amino acids. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 1381-1385.	2.2	28
943	Carbonic anhydrases activation with 3-amino-1H-1,2,4-triazole-1-carboxamides: Discovery of subnanomolar isoform II activators. Bioorganic and Medicinal Chemistry, 2017, 25, 1681-1686.	3.0	28
944	Biochemical characterization of the native α-carbonic anhydrase purified from the mantle of the Mediterranean mussel, <i>Mytilus galloprovincialis</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 632-639.	5.2	28
945	Discovery of curcumin inspired sulfonamide derivatives as a new class of carbonic anhydrase isoforms I, II, IX, and XII inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1274-1281.	5.2	28
946	Synthesis, biological activity and multiscale molecular modeling studies for coumaryl-carboxamide derivatives as selective carbonic anhydrase IX inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1042-1052.	5.2	28
947	Novel carbonic anhydrase IXâ€ŧargeted therapy enhances the antiâ€ŧumour effects of cisplatin in small cell lung cancer. International Journal of Cancer, 2018, 142, 191-201.	5.1	28
948	Mycobacterium tuberculosis β-Carbonic Anhydrases: Novel Targets for Developing Antituberculosis Drugs. International Journal of Molecular Sciences, 2019, 20, 5153.	4.1	28
949	Novel 2-substituted-benzimidazole-6-sulfonamides as carbonic anhydrase inhibitors: synthesis, biological evaluation against isoforms I, II, IX and XII and molecular docking studies. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1697-1710.	5.2	28
950	<i>Leishmania infantum</i> arginase: biochemical characterization and inhibition by naturally occurring phenolic substances. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1100-1109.	5.2	28
951	Direct and straightforward access to substituted alkyl selenols as novel carbonic anhydrase inhibitors. European Journal of Medicinal Chemistry, 2020, 185, 111811.	5.5	28
952	Chagas Disease: Perspectives on the Past and Present and Challenges in Drug Discovery. Molecules, 2020, 25, 5483.	3.8	28
953	Tellurides Bearing Sulfonamides as Novel Inhibitors of Leishmanial Carbonic Anhydrase with Potent Antileishmanial Activity. Journal of Medicinal Chemistry, 2020, 63, 4306-4314.	6.4	28
954	Perfluoroalkyl Substances of Significant Environmental Concern Can Strongly Inhibit Human Carbonic Anhydrase Isozymes. Analytical Chemistry, 2020, 92, 4614-4622.	6.5	28

#	Article	IF	CITATIONS
955	Carbonic Anhydrase Inhibitors. Part 461 Inhibition of Carbonic Anhydrase Isozymes I, II and IV With Trifluoromethylsulfonamide Derivatives and Their Zinc(II) and Copper(II) Complexes. Metal-Based Drugs, 1997, 4, 27-34.	3.8	27
956	Protease inhibitors. Part 7. European Journal of Pharmaceutical Sciences, 2000, 10, 67-76.	4.0	27
957	Agents that target cysteine residues of biomolecules and their therapeutic potential. Expert Opinion on Therapeutic Patents, 2001, 11, 765-787.	5.0	27
958	Carbonic anhydrase activators. The selective serotonin reuptake inhibitors fluoxetine, sertraline and citalopram are strong activators of isozymes I and II. Bioorganic and Medicinal Chemistry Letters, 2003, 13, 2765-2768.	2.2	27
959	Bidentate Zinc Chelators for αâ€Carbonic Anhydrases that Produce a Trigonal Bipyramidal Coordination Geometry. ChemMedChem, 2010, 5, 1609-1615.	3.2	27
960	Carbonic anhydrase inhibitors. The Î ² -carbonic anhydrases from the fungal pathogens Cryptococcus neoformans and Candida albicans are strongly inhibited by substituted-phenyl-1H-indole-5-sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 2508-2511.	2.2	27
961	Carbonic anhydrase inhibitors: Crystallographic and solution binding studies for the interaction of a boron-containing aromatic sulfamide with mammalian isoforms l–XV. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 3601-3605.	2.2	27
962	Protein–Protein Interactions: Inhibition of Mammalian Carbonic Anhydrases I–XV by the Murine Inhibitor of Carbonic Anhydrase and Other Members of the Transferrin Family. Journal of Medicinal Chemistry, 2012, 55, 5529-5535.	6.4	27
963	Synthesis of C-cinnamoyl glycosides and their inhibitory activity against mammalian carbonic anhydrases. Bioorganic and Medicinal Chemistry, 2013, 21, 1489-1494.	3.0	27
964	Cloning, characterization and anion inhibition study of a β-class carbonic anhydrase from the caries producing pathogen Streptococcus mutans. Bioorganic and Medicinal Chemistry, 2015, 23, 2995-3001.	3.0	27
965	Synthesis of novel acridine bis-sulfonamides with effective inhibitory activity against the carbonic anhydrase isoforms I, II, IX and XII. Bioorganic and Medicinal Chemistry, 2015, 23, 6573-6580.	3.0	27
966	Anion inhibition studies of the dandruff-producing fungus Malassezia globosa β-carbonic anhydrase MgCA. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 5194-5198.	2.2	27
967	<i>N</i> -Acylbenzenesulfonamide Dihydro-1,3,4-oxadiazole Hybrids: Seeking Selectivity toward Carbonic Anhydrase Isoforms. ACS Medicinal Chemistry Letters, 2017, 8, 792-796.	2.8	27
968	Discovery of thiazolin-4-one-based aromatic sulfamates as a new class of carbonic anhydrase isoforms I, II, IV, and IX inhibitors. Bioorganic Chemistry, 2018, 77, 293-299.	4.1	27
969	Synthesis, biological evaluation and computational studies of novel iminothiazolidinone benzenesulfonamides as potent carbonic anhydrase II and IX inhibitors. Bioorganic Chemistry, 2018, 77, 381-386.	4.1	27
970	Discovery of Benzenesulfonamide Derivatives as Carbonic Anhydrase Inhibitors with Effective Anticonvulsant Action: Design, Synthesis, and Pharmacological Evaluation. Journal of Medicinal Chemistry, 2018, 61, 3151-3165.	6.4	27
971	Carbonic anhydrase inhibition with a series of novel benzenesulfonamide-triazole conjugates. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1565-1574.	5.2	27
972	Novel 6- and 7-Substituted Coumarins with Inhibitory Action against Lipoxygenase and Tumor-Associated Carbonic Anhydrase IX. Molecules, 2018, 23, 153.	3.8	27

#	Article	IF	CITATIONS
973	Selective inhibition of carbonic anhydrase-IX by sulphonamide derivatives induces pH and reactive oxygen species-mediated apoptosis in cervical cancer HeLa cells. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1137-1149.	5.2	27
974	"A Sweet Combination†Developing Saccharin and Acesulfame K Structures for Selectively Targeting the Tumor-Associated Carbonic Anhydrases IX and XII. Journal of Medicinal Chemistry, 2020, 63, 321-333.	6.4	27
975	The antibiotic furagin and its derivatives are isoform-selective human carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1011-1020.	5.2	27
976	A novel acidification mechanism for greatly enhanced oxygen supply to the fish retina. ELife, 2020, 9, .	6.0	27
977	Designing of novel carbonic anhydrase inhibitors and activators. Current Medicinal Chemistry Cardiovascular and Hematological Agents, 2004, 2, 49-68.	1.7	27
978	QSAR study using topological indices for inhibition of carbonic anhydrase II by sulfanilamides and Schiff bases. Molecular Diversity, 2004, 8, 401-412.	3.9	26
979	Carbonic anhydrase inhibitors: inhibition of the membrane-bound human isozyme IV with anions. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 5769-5773.	2.2	26
980	Carbonic anhydrase inhibitors: Inhibition of the tumor-associated isozymes IX and XII with a library of aromatic and heteroaromatic sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 4862-4866.	2.2	26
981	Carbonic anhydrase inhibitors: Inhibition of the cytosolic human isozyme VII with anions. Bioorganic and Medicinal Chemistry Letters, 2006, 16, 3139-3143.	2.2	26
982	Homology Modeling and Receptor-Based 3D-QSAR Study of Carbonic Anhydrase IX. Journal of Chemical Information and Modeling, 2007, 47, 2253-2262.	5.4	26
983	Carbonic anhydrase inhibitors: Selective inhibition of the extracellular, tumor-associated isoforms IX and XII over isozymes I and II with glycosyl-thioureido-sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 5096-5100.	2.2	26
984	Synthesis of glycoconjugate carbonic anhydrase inhibitors by ruthenium-catalysed azide-alkyne 1,3-dipolar cycloaddition. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 6058-6061.	2.2	26
985	Inhibition of β-carbonic anhydrases with ureido-substituted benzenesulfonamides. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 102-105.	2.2	26
986	A new class of quinazoline-sulfonamides acting as efficient inhibitors against the α-carbonic anhydrase from <i>Trypanosoma cruzi</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 581-585.	5.2	26
987	Cloning, characterization and anion inhibition studies of a new Î ³ -carbonic anhydrase from the Antarctic bacterium Pseudoalteromonas haloplanktis. Bioorganic and Medicinal Chemistry, 2015, 23, 4405-4409.	3.0	26
988	Inhibition of mammalian carbonic anhydrase isoforms l–XIV with a series of phenolic acid esters. Bioorganic and Medicinal Chemistry, 2015, 23, 7181-7188.	3.0	26
989	Ascaris lumbricoides β carbonic anhydrase: a potential target enzyme for treatment of ascariasis. Parasites and Vectors, 2015, 8, 479.	2.5	26
990	The anticonvulsant sulfamide JNJ-26990990 and its S,S-dioxide analog strongly inhibit carbonic anhydrases: solution and X-ray crystallographic studies. Organic and Biomolecular Chemistry, 2016, 14, 4853-4858.	2.8	26

#	Article	IF	CITATIONS
991	Indazole, Pyrazole, and Oxazole Derivatives Targeting Nitric Oxide Synthases and Carbonic Anhydrases. ChemMedChem, 2016, 11, 1695-1699.	3.2	26
992	Synthesis and carbonic anhydrase inhibitory properties of amino acid – coumarin/quinolinone conjugates incorporating glycine, alanine and phenylalanine moieties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1198-1202.	5.2	26
993	Burkholderia pseudomallei γ-carbonic anhydrase is strongly activated by amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2017, 27, 77-80.	2.2	26
994	Crystal Structure of Carbonic Anhydrase II in Complex with an Activating Ligand: Implications in Neuronal Function. Molecular Neurobiology, 2018, 55, 7431-7437.	4.0	26
995	Crystal structure of the human carbonic anhydrase II adduct with 1-(4-sulfamoylphenyl-ethyl)-2,4,6-triphenylpyridinium perchlorate, a membrane-impermeant, isoform selective inhibitor. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 151-157.	5.2	26
996	Novel 2-(2-arylmethylthio-4-chloro-5-methylbenzenesulfonyl)-1-(1,3,5-triazin-2-ylamino)guanidine derivatives: Inhibition of human carbonic anhydrase cytosolic isozymes I and II and the transmembrane tumor-associated isozymes IX and XII, anticancer activity, and molecular modeling studies. European Journal of Medicinal Chemistry, 2018, 143, 1931-1941.	5.5	26
997	Evaluation of sulphonamide derivatives acting as inhibitors of human carbonic anhydrase isoforms I, II and <i>Mycobacterium tuberculosis</i> l² -class enzyme Rv3273. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 962-971.	5.2	26
998	The first activation studies of the Îcarbonic anhydrase from the malaria parasite Plasmodium falciparum with amines and amino acids. Bioorganic Chemistry, 2018, 80, 94-98.	4.1	26
999	Pseudomonas aeruginosa \hat{l}^2 -carbonic anhydrase, psCA1, is required for calcium deposition and contributes to virulence. Cell Calcium, 2019, 84, 102080.	2.4	26
1000	A non-catalytic function of carbonic anhydrase IX contributes to the glycolytic phenotype and pH regulation in human breast cancer cells. Biochemical Journal, 2019, 476, 1497-1513.	3.7	26
1001	Carbonic Anhydrase XII Inhibitors Overcome Temozolomide Resistance in Glioblastoma. Journal of Medicinal Chemistry, 2019, 62, 4174-4192.	6.4	26
1002	Bioisosteric Development of Multitarget Nonsteroidal Anti-Inflammatory Drug–Carbonic Anhydrases Inhibitor Hybrids for the Management of Rheumatoid Arthritis. Journal of Medicinal Chemistry, 2020, 63, 2325-2342.	6.4	26
1003	Sulphonamides incorporating 1,3,5-triazine structural motifs show antioxidant, acetylcholinesterase, butyrylcholinesterase, and tyrosinase inhibitory profile. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 424-431.	5.2	26
1004	Synthesis and biological evaluation of some coumarin hybrids as selective carbonic anhydrase IX and XII inhibitors. Bioorganic Chemistry, 2020, 104, 104272.	4.1	26
1005	Structural Basis of Nanomolar Inhibition of Tumor-Associated Carbonic Anhydrase IX: X-Ray Crystallographic and Inhibition Study of Lipophilic Inhibitors with Acetazolamide Backbone. Journal of Medicinal Chemistry, 2020, 63, 13064-13075.	6.4	26
1006	Tail approach synthesis of novel benzenesulfonamides incorporating 1,3,4-oxadiazole hybrids as potent inhibitor of carbonic anhydrase I, II, IX, and XII isoenzymes. European Journal of Medicinal Chemistry, 2020, 193, 112219.	5.5	26
1007	A Highlight on the Inhibition of Fungal Carbonic Anhydrases as Drug Targets for the Antifungal Armamentarium. International Journal of Molecular Sciences, 2021, 22, 4324.	4.1	26
1008	Insights into the binding mode of sulphamates and sulphamides to hCA II: crystallographic studies and binding free energy calculations. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1002-1011.	5.2	26

#	Article	IF	CITATIONS
1009	Discovery of new carbonic anhydrase IX inhibitors as anticancer agents by toning the hydrophobic and hydrophilic rims of the active site to encounter the dual-tail approach. European Journal of Medicinal Chemistry, 2022, 232, 114190.	5.5	26
1010	Repurposing FDA-approved sulphonamide carbonic anhydrase inhibitors for treatment of <i>Neisseria gonorrhoeae</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 51-61.	5.2	26
1011	Antiproliferative effects of sulphonamide carbonic anhydrase inhibitors C18, SLC-0111 and acetazolamide on bladder, glioblastoma and pancreatic cancer cell lines. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 280-286.	5.2	26
1012	Antifungal Activity of Ag(I) and Zn(II) Complexes of Sulfacetamide Derivatives. Metal-Based Drugs, 2000, 7, 49-54.	3.8	25
1013	Carbonic Anhydrase Inhibitors: Synthesis of Schiff Bases of Hydroxybenzaldehydes with Aromatic Sulfonamides and Their Reactions with Arylsulfonyl Isocyanates. Journal of Enzyme Inhibition and Medicinal Chemistry, 2000, 15, 533-546.	0.5	25
1014	Carbonic anhydrase inhibitors. Preparation of potent sulfonamides inhibitors incorporating bile acid tails. Bioorganic and Medicinal Chemistry Letters, 2002, 12, 1551-1557.	2.2	25
1015	Carbonic anhydrase inhibitors. Interaction of isozymes I, II, IV, V, and IX with organic phosphates and phosphonates. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 1683-1686.	2.2	25
1016	Carbonic anhydrase inhibitors: synthesis and inhibition of cytosolic/tumor-associated carbonic anhydrase isozymes I, II, and IX with sulfonamides incorporating thioureido-sulfanilyl scaffolds. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 2359-2364.	2.2	25
1017	Exploration of the Binding Mode of Indanesulfonamides as Selective Inhibitors of Human Carbonic Anhydrase Typeâ€VII by Targeting Lys 91. ChemMedChem, 2007, 2, 1273-1280.	3.2	25
1018	Carbonic anhydrase inhibitors. Biphenylsulfonamides with inhibitory action towards the transmembrane, tumor-associated isozymes IX possess cytotoxic activity against human colon, lung and breast cancer cell lines. Journal of Enzyme Inhibition and Medicinal Chemistry, 2009, 24, 499-505.	5.2	25
1019	Identification of Potent and Selective Human Carbonic Anhydraseâ€VII (hCAâ€VII) Inhibitors. ChemMedChem, 2010, 5, 823-826.	3.2	25
1020	Carbonic anhydrase inhibitors. Regioselective synthesis of novel 1-substituted 1,4-dihydro-4-oxo-3-pyridinesulfonamides and their inhibition of the human cytosolic isozymes I and II and transmembrane cancer-associated isozymes IX and XII. European Journal of Medicinal Chemistry, 2010, 45, 3656-3661.	5.5	25
1021	Flavones and structurally related 4-chromenones inhibit carbonic anhydrases by a different mechanism of action compared to coumarins. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 3063-3066.	2.2	25
1022	Carbonic anhydrase inhibitors: Synthesis and inhibition of the human carbonic anhydrase isoforms I, II, VII, IX and XII with benzene sulfonamides incorporating 4,5,6,7-tetrabromophthalimide moiety. Bioorganic and Medicinal Chemistry, 2013, 21, 5973-5982.	3.0	25
1023	Anion inhibition study of the β-carbonic anhydrase (CahB1) from the cyanobacterium Coleofasciculus chthonoplastes (ex-Microcoleus chthonoplastes). Bioorganic and Medicinal Chemistry, 2014, 22, 1667-1671.	3.0	25
1024	Synthesis of sulfonamides incorporating piperazinyl-ureido moieties and their carbonic anhydrase I, II, IX and XII inhibitory activity. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 3850-3853.	2.2	25
1025	Mapping Selective Inhibition of the Cancer-Related Carbonic Anhydrase IX Using Structure–Activity Relationships of Glucosyl-Based Sulfamates. Journal of Medicinal Chemistry, 2015, 58, 6630-6638.	6.4	25
1026	7-Amino-3,4-dihydro-1H-quinolin-2-one, a compound similar to the substituted coumarins, inhibits α -carbonic anhydrases without hydrolysis of the lactam ring. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 773-777.	5.2	25

#	Article	IF	CITATIONS
1027	Dynamic encapsulation and activation of carbonic anhydrase in multivalent dynameric host matrices. Chemical Communications, 2016, 52, 4053-4055.	4.1	25
1028	Synthesis of isoxazole-containing sulfonamides with potent carbonic anhydrase II and VII inhibitory properties. Bioorganic and Medicinal Chemistry, 2017, 25, 1456-1464.	3.0	25
1029	Synthesis and human/bacterial carbonic anhydrase inhibition with a series of sulfonamides incorporating phthalimido moieties. Bioorganic and Medicinal Chemistry, 2017, 25, 2524-2529.	3.0	25
1030	Novel sulfonamide-containing 2-indolinones that selectively inhibit tumor-associated alpha carbonic anhydrases. Bioorganic and Medicinal Chemistry, 2017, 25, 3714-3718.	3.0	25
1031	Production and covalent immobilisation of the recombinant bacterial carbonic anhydrase (SspCA) onto magnetic nanoparticles. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 759-766.	5.2	25
1032	Sulfonamide inhibition profile of the Î ³ -carbonic anhydrase identified in the genome of the pathogenic bacterium Burkholderia pseudomallei the etiological agent responsible of melioidosis. Bioorganic and Medicinal Chemistry Letters, 2017, 27, 490-495.	2.2	25
1033	Synthesis and biological evaluation of novel pyrazoline-based aromatic sulfamates with potent carbonic anhydrase isoforms II, IV and IX inhibitory efficacy. Bioorganic Chemistry, 2018, 77, 633-639.	4.1	25
1034	Synthesis of novel tellurides bearing benzensulfonamide moiety as carbonic anhydrase inhibitors with antitumor activity. European Journal of Medicinal Chemistry, 2019, 181, 111586.	5.5	25
1035	Prostaglandin receptor agonists as antiglaucoma agents (a patent review 2013 – 2018). Expert Opinion on Therapeutic Patents, 2019, 29, 793-803.	5.0	25
1036	Benzensulfonamides bearing spyrohydantoin moieties act as potent inhibitors of human carbonic anhydrases II and VII and show neuropathic pain attenuating effects. European Journal of Medicinal Chemistry, 2019, 177, 188-197.	5.5	25
1037	Pain Relieving Effect of-NSAIDs-CAIs Hybrid Molecules: Systemic and Intra-Articular Treatments against Rheumatoid Arthritis. International Journal of Molecular Sciences, 2019, 20, 1923.	4.1	25
1038	Assessment of the antiproliferative and apoptotic roles of sulfonamide carbonic anhydrase IX inhibitors in HeLa cancer cell line. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 75-86.	5.2	25
1039	Inhibitory activity against carbonic anhydrase IX and XII as a candidate selection criterion in the development of new anticancer agents. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1555-1561.	5.2	25
1040	<i>Escherichia coli γ</i> -carbonic anhydrase: characterisation and effects of simple aromatic/heterocyclic sulphonamide inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1545-1554.	5.2	25
1041	Benzoxaboroles: New Potent Inhibitors of the Carbonic Anhydrases of the Pathogenic Bacterium <i>Vibrio cholerae</i> . ACS Medicinal Chemistry Letters, 2020, 11, 2277-2284.	2.8	25
1042	Selenolesterase enzyme activity of carbonic anhydrases. Chemical Communications, 2020, 56, 4444-4447.	4.1	25
1043	Pharmacological Inhibition of CA-IX Impairs Tumor Cell Proliferation, Migration and Invasiveness. International Journal of Molecular Sciences, 2020, 21, 2983.	4.1	25
1044	Benzoxepinones: A new isoform-selective class of tumor associated carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry, 2020, 28, 115496.	3.0	25

#	Article	IF	CITATIONS
1045	Protease inhibitors targeting the main protease and papain-like protease of coronaviruses. Expert Opinion on Therapeutic Patents, 2021, 31, 309-324.	5.0	25
1046	Bacterial carbonic anhydrases: underexploited antibacterial therapeutic targets. Future Medicinal Chemistry, 2021, 13, 1619-1622.	2.3	25
1047	Are Carbonic Anhydrases Suitable Targets to Fight Protozoan Parasitic Diseases?. Current Medicinal Chemistry, 2019, 25, 5266-5278.	2.4	25
1048	Flavonoids as tyrosinase inhibitors in <i>in silico</i> and <i>inÂvitro</i> models: basic framework of SAR using a statistical modelling approach. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 427-436.	5.2	25
1049	Complexes With Biologically Active Ligands. Part 101 Inhibition of Carbonic Anhydrase Isozymes I and II With Metal Complexes of Imidazo[2,1â`b]-1,3,4-Thiadiazole-2-Sulfonamide. Metal-Based Drugs, 1997, 4, 19-26.	3.8	24
1050	Carbonic Anhydrase Inhibitors: Inhibition of Isozymes I, II And IV with Heterocyclic Mercaptans, Sulfenamides, Sulfonamides and their Metal Complexes. Journal of Enzyme Inhibition and Medicinal Chemistry, 1998, 13, 177-194.	0.5	24
1051	Carbonic anhydrase inhibitors. Interaction of isozymes I, II, IV, V, and IX with phosphates, carbamoyl phosphate, and the phosphonate antiviral drug foscarnet. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 5763-5767.	2.2	24
1052	Carbonic anhydrase inhibitors: Inhibition of the human isozymes I, II, VA, and IX with a library of substituted difluoromethanesulfonamides. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 5192-5196.	2.2	24
1053	Carbonic anhydrase inhibitors: 2-Substituted-1,3,4-thiadiazole-5-sulfamides act as powerful and selective inhibitors of the mitochondrial isozymes VA and VB over the cytosolic and membrane-associated carbonic anhydrases I, II and IV. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 6332-6335.	2.2	24
1054	Cloning, Expression, Post-Translational Modifications and Inhibition Studies on the Latest Mammalian Carbonic Anhydrase Isoform, CA XV. Journal of Medicinal Chemistry, 2009, 52, 646-654.	6.4	24
1055	Carbonic anhydrase inhibitors: purification and inhibition studies of pigeon (<i>Columba) Tj ETQq1 1 0.784314 r Enzyme Inhibition and Medicinal Chemistry, 2011, 26, 749-753.</i>	gBT /Overl 5.2	ock 10 Tf 50 24
1056	Synthesis, Structure–Activity Relationship Studies, and X-ray Crystallographic Analysis of Arylsulfonamides as Potent Carbonic Anhydrase Inhibitors. Journal of Medicinal Chemistry, 2012, 55, 3891-3899.	6.4	24
1057	QSARs on human carbonic anhydrase VA and VB inhibitors of some new not yet synthesized, substituted aromatic/heterocyclic sulphonamides as anti-obesity agent. Journal of Enzyme Inhibition and Medicinal Chemistry, 2012, 27, 666-672.	5.2	24
1058	Synthesis of aminocyanopyrazoles via a multi-component reaction and anti-carbonic anhydrase inhibitory activity of their sulfamide derivatives against cytosolic and transmembrane isoforms. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 343-349.	5.2	24
1059	Synthesis and carbonic anhydrase I, II, IX and XII inhibition studies of 4-N,N-disubstituted sulfanilamides incorporating 4,4,4-trifluoro-3-oxo-but-1-enyl, phenacylthiourea and imidazol-2(3H)-one/thione moieties. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 1776-1779.	2.2	24
1060	Synthesis of a novel affinity gel for the purification of carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 240-244.	5.2	24
1061	Carbonic anhydrase inhibitors: Design, synthesis and structural characterization of new heteroaryl-N-carbonylbenzenesulfonamides targeting druggable human carbonic anhydrase isoforms. European Journal of Medicinal Chemistry, 2015, 102, 223-232.	5.5	24
1062	Spirobisnaphthalenes effectively inhibit carbonic anhydrase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 31, 1-5.	5.2	24

#	Article	IF	CITATIONS
1063	3-Hydroxy-1 <i>H</i> -quinazoline-2,4-dione as a New Scaffold To Develop Potent and Selective Inhibitors of the Tumor-Associated Carbonic Anhydrases IX and XII. Journal of Medicinal Chemistry, 2017, 60, 6428-6439.	6.4	24
1064	Novel Sulfamide-Containing Compounds as Selective Carbonic Anhydrase I Inhibitors. Molecules, 2017, 22, 1049.	3.8	24
1065	Design, synthesis and biological activity of selective hCAs inhibitors based on 2-(benzylsulfinyl)benzoic acid scaffold. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1400-1413.	5.2	24
1066	Synthesis and biological evaluation of novel 3-(quinolin-4-ylamino)benzenesulfonamides as carbonic anhydrase isoforms I and II inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1457-1464.	5.2	24
1067	Structure-activity relationship with pyrazoline-based aromatic sulfamates as carbonic anhydrase isoforms I, II, IX and XII inhibitors: Synthesis and biological evaluation. European Journal of Medicinal Chemistry, 2019, 182, 111638.	5.5	24
1068	Pyridazinone-substituted benzenesulfonamides display potent inhibition of membrane-bound human carbonic anhydrase IX and promising antiproliferative activity against cancer cell lines. European Journal of Medicinal Chemistry, 2019, 168, 301-314.	5.5	24
1069	Synthesis and carbonic anhydrase inhibitory properties of novel 4-(2-aminoethyl)benzenesulfonamide-dipeptide conjugates. Bioorganic Chemistry, 2019, 83, 414-423.	4.1	24
1070	Synthesis and cytotoxic activities of novel copper and silver complexes of 1,3-diaryltriazene-substituted sulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 110-116.	5.2	24
1071	Novel sulphonamides incorporating triazene moieties show powerful carbonic anhydrase I and II inhibitory properties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 325-329.	5.2	24
1072	Pyridinium derivatives of 3-aminobenzenesulfonamide are nanomolar-potent inhibitors of tumor-expressed carbonic anhydrase isozymes CA IX and CA XII. Bioorganic Chemistry, 2020, 103, 104204.	4.1	24
1073	Advances in the discovery of novel agents for the treatment of glaucoma. Expert Opinion on Drug Discovery, 2021, 16, 1209-1225.	5.0	24
1074	Inhibition of Carbonic Anhydrase IX Promotes Apoptosis through Intracellular pH Level Alterations in Cervical Cancer Cells. International Journal of Molecular Sciences, 2021, 22, 6098.	4.1	24
1075	Identification of N-phenyl-2-(phenylsulfonyl)acetamides/propanamides as new SLC-0111 analogues: Synthesis and evaluation of the carbonic anhydrase inhibitory activities. European Journal of Medicinal Chemistry, 2021, 218, 113360.	5.5	24
1076	Coumarins effectively inhibit bacterial $\hat{l}\pm$ -carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 333-338.	5.2	24
1077	Carbonic Anhydrase Inhibitors. Inhibition of Cytosolic Isozymes I and II and Transmembrane, Cancer-associated Isozyme IX with Lipophilic Sulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2003, 18, 333-338.	5.2	23
1078	Carbonic anhydrase inhibitors: Synthesis and inhibition studies against mammalian isoforms l–XV with a series of 2-(hydrazinocarbonyl)-3-substituted-phenyl-1H-indole-5-sulfonamides. Bioorganic and Medicinal Chemistry, 2008, 16, 9113-9120.	3.0	23
1079	Carbonic anhydrase inhibitors. Inhibition of the cytosolic and tumor-associated carbonic anhydrase isozymes I, II and IX with some 1,3,4-oxadiazole- and 1,2,4-triazole-thiols. Journal of Enzyme Inhibition and Medicinal Chemistry, 2008, 23, 101-107.	5.2	23
1080	Carbonic anhydrase activators: Activation of human isozymes I, II and IX with phenylsulfonylhydrazido l-histidine derivatives. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 2440-2443.	2.2	23

#	Article	IF	CITATIONS
1081	Carbonic anhydrase I and II activation with mono- and dihalogenated histamine derivatives. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 4884-4887.	2.2	23
1082	Carbamoylphosphonates Control Tumor Cell Proliferation and Dissemination by Simultaneously Inhibiting Carbonic Anhydrase IX and Matrix Metalloproteinase-2. Toward Nontoxic Chemotherapy Targeting Tumor Microenvironment. Journal of Medicinal Chemistry, 2012, 55, 7875-7882.	6.4	23
1083	Effect of incorporating a thiophene tail in the scaffold of acetazolamide on the inhibition of human carbonic anhydrase isoforms I, II, IX and XII. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 5646-5649.	2.2	23
1084	Inhibition studies of new ureido-substituted sulfonamides incorporating a GABA moiety against human carbonic anhydrase isoforms l–XIV. Bioorganic and Medicinal Chemistry, 2014, 22, 6768-6775.	3.0	23
1085	Dual carbonic anhydrase/matrix metalloproteinase inhibitors incorporating bisphosphonic acid moieties targeting bone tumors. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 2617-2620.	2.2	23
1086	Sulfonamides with Potent Inhibitory Action and Selectivity against the α-Carbonic Anhydrase from <i>Vibrio cholerae</i> . ACS Medicinal Chemistry Letters, 2014, 5, 826-830.	2.8	23
1087	Fluorescent Silica Nanoparticles with Multivalent Inhibitory Effects towards Carbonic Anhydrases. Chemistry - A European Journal, 2015, 21, 10306-10309.	3.3	23
1088	The β-carbonic anhydrase from the malaria mosquito Anopheles gambiae is highly inhibited by sulfonamides. Bioorganic and Medicinal Chemistry, 2015, 23, 2303-2309.	3.0	23
1089	C-glycosides incorporating the 6-methoxy-2-naphthyl moiety are selective inhibitors of fungal and bacterial carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 857-861.	5.2	23
1090	Identification and inhibition of carbonic anhydrases from nematodes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 176-184.	5.2	23
1091	Design, synthesis and biological evaluation of <i>N</i> -(5-methyl-isoxazol-3-yl/1,3,4-thiadiazol-2-yl)-4-(3-substitutedphenylureido) benzenesulfonamides as human carbonic anhydrase isoenzymes I, II, VII and XII inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 174-179.	5.2	23
1092	Isatin analogs as novel inhibitors of Candida spp. β-carbonic anhydrase enzymes. Bioorganic and Medicinal Chemistry, 2016, 24, 1648-1652.	3.0	23
1093	Hydroxamic acid derivatives: a promising scaffold for rational compound optimization in Chagas disease. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 964-973.	5.2	23
1094	Synthesis and carbonic anhydrase inhibition of polycyclic imides incorporating N-benzenesulfonamide moieties. Bioorganic and Medicinal Chemistry, 2017, 25, 5373-5379.	3.0	23
1095	Exploring Heteroaryl-pyrazole Carboxylic Acids as Human Carbonic Anhydrase XII Inhibitors. ACS Medicinal Chemistry Letters, 2017, 8, 941-946.	2.8	23
1096	The Crystal Structure of a hCA VII Variant Provides Insights into the Molecular Determinants Responsible for Its Catalytic Behavior. International Journal of Molecular Sciences, 2018, 19, 1571.	4.1	23
1097	Structural Mapping of Anion Inhibitors to βâ€Carbonic Anhydrase psCA3 from <i>Pseudomonas aeruginosa</i> . ChemMedChem, 2018, 13, 2024-2029.	3.2	23
1098	A computer-assisted discovery of novel potential anti-obesity compounds as selective carbonic anhydrase VA inhibitors. European Journal of Medicinal Chemistry, 2019, 181, 111565.	5.5	23

#	Article	IF	CITATIONS
1099	Biochemical and Structural Insights into Carbonic Anhydrase XII/Fab6A10 Complex. Journal of Molecular Biology, 2019, 431, 4910-4921.	4.2	23
1100	α-Carbonic anhydrases are strongly activated by spinaceamine derivatives. Bioorganic and Medicinal Chemistry, 2019, 27, 800-804.	3.0	23
1101	Novel 8-Substituted Coumarins That Selectively Inhibit Human Carbonic Anhydrase IX and XII. International Journal of Molecular Sciences, 2019, 20, 1208.	4.1	23
1102	4-Substituted benzenesulfonamides featuring cyclic imides moieties exhibit potent and isoform-selective carbonic anhydrase II/IX inhibition. Bioorganic Chemistry, 2019, 83, 198-204.	4.1	23
1103	Pyrrolo and pyrrolopyrimidine sulfonamides act as cytotoxic agents in hypoxia via inhibition of transmembrane carbonic anhydrases. European Journal of Medicinal Chemistry, 2020, 188, 112021.	5.5	23
1104	Intracellular Binding/Unbinding Kinetics of Approved Drugs to Carbonic Anhydrase II Observed by in-Cell NMR. ACS Chemical Biology, 2020, 15, 2792-2800.	3.4	23
1105	The Carbonic Anhydrase IX inhibitor SLC-0111 as emerging agent against the mesenchymal stem cell-derived pro-survival effects on melanoma cells. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1185-1193.	5.2	23
1106	Synthesis of calix[4]azacrown substituted sulphonamides with antioxidant, acetylcholinesterase, butyrylcholinesterase, tyrosinase and carbonic anhydrase inhibitory action. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1215-1223.	5.2	23
1107	Coumarins from <i>Magydaris pastinacea</i> as inhibitors of the tumour-associated carbonic anhydrases IX and XII: isolation, biological studies and in silico evaluation. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 539-548.	5.2	23
1108	Small-molecule CD73 inhibitors for the immunotherapy of cancer: a patent and literature review (2017–present). Expert Opinion on Therapeutic Patents, 2021, 31, 867-876.	5.0	23
1109	Chalcogenides-incorporating carbonic anhydrase inhibitors concomitantly reverted oxaliplatin-induced neuropathy and enhanced antiproliferative action. European Journal of Medicinal Chemistry, 2021, 225, 113793.	5.5	23
1110	Metal Binding Functions in the Design of Carbonic Anhydrase Inhibitors. Current Topics in Medicinal Chemistry, 2007, 7, 835-848.	2.1	22
1111	Carbonic anhydrase inhibitors. Interaction of 2-N,N-dimethylamino-1,3,4-thiadiazole-5-methanesulfonamide with 12 mammalian isoforms: Kinetic and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 999-1005.	2.2	22
1112	Serendipitous fragment-based drug discovery: ketogenic diet metabolites and statins effectively inhibit several carbonic anhydrases. Chemical Communications, 2012, 48, 3551.	4.1	22
1113	Carbonic anhydrase inhibitors. Inhibition of human cytosolic isoforms I and II with (reduced) Schiff's bases incorporating sulfonamide, carboxylate and carboxymethyl moieties. Bioorganic and Medicinal Chemistry, 2014, 22, 2867-2874.	3.0	22
1114	Sulfamide derivatives with selective carbonic anhydrase VII inhibitory action. Bioorganic and Medicinal Chemistry, 2016, 24, 894-901.	3.0	22
1115	New approach of delivering cytotoxic drugs towards CAIX expressing cells: A concept of dual-target drugs. European Journal of Medicinal Chemistry, 2017, 127, 691-702.	5.5	22
1116	Amino Acids as Building Blocks for Carbonic Anhydrase Inhibitors. Metabolites, 2018, 8, 36.	2.9	22

#	Article	IF	CITATIONS
1117	Activation of human α-carbonic anhydrase isoforms I, II, IV and VII with bis-histamine schiff bases and bis-spinaceamine substituted derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1193-1198.	5.2	22
1118	Cloning, Purification, and Characterization of a Î ² -Carbonic Anhydrase from Malassezia restricta, an Opportunistic Pathogen Involved in Dandruff and Seborrheic Dermatitis. International Journal of Molecular Sciences, 2019, 20, 2447.	4.1	22
1119	Indole-Based Hydrazones Containing A Sulfonamide Moiety as Selective Inhibitors of Tumor-Associated Human Carbonic Anhydrase Isoforms IX and XII. International Journal of Molecular Sciences, 2019, 20, 2354.	4.1	22
1120	Carbonic Anhydrases: An Overview. , 2015, , 3-13.		22
1121	Carbonic Anhydrase IX Inhibitors as Candidates for Combination Therapy of Solid Tumors. International Journal of Molecular Sciences, 2021, 22, 13405.	4.1	22
1122	A physically interpretable quantum-theoretic QSAR for some carbonic anhydrase inhibitors with diverse aromatic rings, obtained by a new QSAR procedure. Bioorganic and Medicinal Chemistry, 2005, 13, 2197-2211.	3.0	21
1123	Carbonic anhydrase inhibitors: Inhibition of the human transmembrane isozyme XIV with a library of aromatic/heterocyclic sulfonamides. Bioorganic and Medicinal Chemistry, 2005, 13, 6089-6093.	3.0	21
1124	Indanesulfonamides as carbonic anhydrase inhibitors and anticonvulsant agents: Structure–activity relationship and pharmacological evaluation. European Journal of Medicinal Chemistry, 2008, 43, 2853-2860.	5.5	21
1125	Carbonic anhydrase activators: Activation of the β-carbonic anhydrase Nce103 from the yeast Saccharomyces cerevisiae with amines and amino acids. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 1662-1665.	2.2	21
1126	Carbonic Anhydrase Inhibitors. Comparison of Aliphatic Sulfamate/Bis-sulfamate Adducts with Isozymes II and IX as a Platform for Designing Tight-Binding, More Isoform-Selective Inhibitors. Journal of Medicinal Chemistry, 2009, 52, 5990-5998.	6.4	21
1127	4-Functionalized 1,3-diarylpyrazoles bearing 6-aminosulfonylbenzothiazole moiety as potent inhibitors of carbonic anhydrase isoforms hCA I, II, IX and XII. Bioorganic and Medicinal Chemistry, 2014, 22, 6945-6952.	3.0	21
1128	Synthesis of sulfonamides with effective inhibitory action against Porphyromonas gingivalis γ-carbonic anhydrase. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 4006-4010.	2.2	21
1129	Carbonic Anhydrase Inhibitors: Design, Synthesis, and Biological Evaluation of Novel Sulfonyl Semicarbazide Derivatives. ACS Medicinal Chemistry Letters, 2014, 5, 793-796.	2.8	21
1130	Synthesis of 3,4-dihydroxypyrrolidine-2,5-dione and 3,5-dihydroxybenzoic acid derivatives and evaluation of the carbonic anhydrase I and II inhibition. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 896-900.	5.2	21
1131	Isoform-selective inhibitory profile of 2-imidazoline-substituted benzene sulfonamides against a panel of human carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 197-202.	5.2	21
1132	Effective Access to Multivalent Inhibitors of Carbonic Anhydrases Promoted by Peptide Bioconjugation. Chemistry - A European Journal, 2017, 23, 6788-6794.	3.3	21
1133	Acyl selenoureido benzensulfonamides show potent inhibitory activity against carbonic anhydrases from the pathogenic bacterium Vibrio cholerae. Bioorganic Chemistry, 2017, 75, 170-172.	4.1	21
1134	Evaluation of 99mTc-sulfonamide and sulfocoumarin derivatives for imaging carbonic anhydrase IX expression. Journal of Inorganic Biochemistry, 2018, 185, 63-70.	3.5	21

#	Article	IF	CITATIONS
1135	Resolution of co-eluting isomers of anti-inflammatory drugs conjugated to carbonic anhydrase inhibitors from plasma in liquid chromatography by energy-resolved tandem mass spectrometry. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 671-679.	5.2	21
1136	The zinc – but not cadmium – containing ζ-carbonic from the diatom Thalassiosira weissflogii is potently activated by amines and amino acids. Bioorganic Chemistry, 2018, 80, 261-265.	4.1	21
1137	Synthesis, biological evaluation and in silico studies with 4-benzylidene-2-phenyl-5(4H)-imidazolone-based benzenesulfonamides as novel selective carbonic anhydrase IX inhibitors endowed with anticancer activity. Bioorganic Chemistry, 2019, 90, 103102.	4.1	21
1138	Multivalent Carbonic Anhydrases Inhibitors. International Journal of Molecular Sciences, 2019, 20, 5352.	4.1	21
1139	Adrenergic agonists and antagonists as antiglaucoma agents: a literature and patent review (2013–2019). Expert Opinion on Therapeutic Patents, 2019, 29, 805-815.	5.0	21
1140	Novel Diamide-Based Benzenesulfonamides as Selective Carbonic Anhydrase IX Inhibitors Endowed with Antitumor Activity: Synthesis, Biological Evaluation and In Silico Insights. International Journal of Molecular Sciences, 2019, 20, 2484.	4.1	21
1141	N-Nitrosulfonamides as Carbonic Anhydrase Inhibitors: A Promising Chemotype for Targeting Chagas Disease and Leishmaniasis. ACS Medicinal Chemistry Letters, 2019, 10, 413-418.	2.8	21
1142	Carbonic anhydrase IX as a novel candidate in liquid biopsy. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 255-260.	5.2	21
1143	Design, synthesis and biological evaluation of coumarin linked 1,2,4-oxadiazoles as selective carbonic anhydrase IX and XII inhibitors. Bioorganic Chemistry, 2020, 98, 103739.	4.1	21
1144	Sulfonamide Inhibition Studies of an α-Carbonic Anhydrase from Schistosoma mansoni, a Platyhelminth Parasite Responsible for Schistosomiasis. International Journal of Molecular Sciences, 2020, 21, 1842.	4.1	21
1145	Is carbonic anhydrase inhibition useful as a complementary therapy of Covid-19 infection?. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1230-1235.	5.2	21
1146	Activation of carbonic anhydrase isoforms involved in modulation of emotional memory and cognitive disorders with histamine agonists, antagonists and derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 719-726.	5.2	21
1147	Structure-activity relationship studies for inhibitors for vancomycin-resistant <i>Enterococcus</i> and human carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1838-1844.	5.2	21
1148	Carbonic Anhydrase Inhibitors: Metal Complexes of a Sulfanilamide Derived Schiff base and their Interaction with Isozymes I, II and IV. Journal of Enzyme Inhibition and Medicinal Chemistry, 2001, 16, 499-505.	0.5	20
1149	QSAR study on pKa vis-Ã-vis physiological activity of sulfonamides: a dominating role of surface tension (inverse steric parameter). Bioorganic and Medicinal Chemistry Letters, 2005, 15, 203-209.	2.2	20
1150	Carbonic anhydrase inhibitors: Inhibition of the tumor-associated isozymes IX and XII with polyfluorinated aromatic/heterocyclic sulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2005, 20, 211-217.	5.2	20
1151	Inhibitors of HIV-1 protease: 10 years after. Expert Opinion on Therapeutic Patents, 2006, 16, 1067-1091.	5.0	20
1152	Saccharomyces cerevisiae β-Carbonic Anhydrase: Inhibition and Activation Studies. Current Pharmaceutical Design, 2010, 16, 3327-3336.	1.9	20

#	Article	IF	CITATIONS
1153	Design, solid-phase synthesis, and biological evaluation of novel 1,5-diarylpyrrole-3-carboxamides as carbonic anhydrase IX inhibitors. Bioorganic and Medicinal Chemistry, 2010, 18, 7392-7401.	3.0	20
1154	o-Benzenedisulfonimido–sulfonamides are potent inhibitors of the tumor-associated carbonic anhydrase isoforms CA IX and CA XII. Bioorganic and Medicinal Chemistry, 2013, 21, 1386-1391.	3.0	20
1155	Inhibition of tumor-associated human carbonic anhydrase isozymes IX and XII by a new class of substituted-phenylacetamido aromatic sulfonamides. Bioorganic and Medicinal Chemistry, 2013, 21, 5228-5232.	3.0	20
1156	Inhibition pattern of sulfamide-related compounds in binding to carbonic anhydrase isoforms I, II, VII, XII and XIV. Bioorganic and Medicinal Chemistry, 2013, 21, 1410-1418.	3.0	20
1157	Structural effect of phenyl ring compared to thiadiazole based adamantyl-sulfonamides on carbonic anhydrase inhibition. Bioorganic and Medicinal Chemistry, 2013, 21, 2314-2318.	3.0	20
1158	More effective dithiocarbamate derivatives inhibiting carbonic anhydrases, generated by QSAR and computational design. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 350-359.	5.2	20
1159	Natural Product Polyamines That Inhibit Human Carbonic Anhydrases. BioMed Research International, 2014, 2014, 1-6.	1.9	20
1160	Mono- and di-halogenated histamine, histidine and carnosine derivatives are potent carbonic anhydrase I, II, VII, XII and XIV activators. Bioorganic and Medicinal Chemistry, 2014, 22, 4752-4758.	3.0	20
1161	Substituted benzene sulfonamides incorporating 1,3,5-triazinyl moieties potently inhibit human carbonic anhydrases II, IX and XII. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 1310-1314.	2.2	20
1162	1,2-Benzisothiazole Derivatives Bearing 4-, 5-, or 6-Alkyl/arylcarboxamide Moieties Inhibit Carbonic Anhydrase Isoform IX (CAIX) and Cell Proliferation under Hypoxic Conditions. Journal of Medicinal Chemistry, 2016, 59, 6547-6552.	6.4	20
1163	Inhibition of carbonic anhydrase isoforms I, II, IX and XII with secondary sulfonamides incorporating benzothiazole scaffolds. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1306-1311.	5.2	20
1164	Synthesis of N-alkyl (aril)-tetra pyrimidine thiones and investigation of their human carbonic anhydrase I and II inhibitory effects. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1192-1197.	5.2	20
1165	Fluorescent sulfonamide carbonic anhydrase inhibitors incorporating 1,2,3-triazole moieties: Kinetic and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry, 2016, 24, 104-112.	3.0	20
1166	Sulfonamide inhibition profiles of the β-carbonic anhydrase from the pathogenic bacterium Francisella tularensis responsible of the febrile illness tularemia. Bioorganic and Medicinal Chemistry, 2017, 25, 3555-3561.	3.0	20
1167	5-Substituted-benzylsulfanyl-thiophene-2-sulfonamides with effective carbonic anhydrase inhibitory activity: Solution and crystallographic investigations. Bioorganic and Medicinal Chemistry, 2017, 25, 857-863.	3.0	20
1168	Design, Synthesis, and X-ray of Selenides as New Class of Agents for Prevention of Diabetic Cerebrovascular Pathology. ACS Medicinal Chemistry Letters, 2018, 9, 462-467.	2.8	20
1169	Biochemical, biophysical and molecular dynamics studies on the proteoglycan-like domain of carbonic anhydrase IX. Cellular and Molecular Life Sciences, 2018, 75, 3283-3296.	5.4	20
1170	Carbonic Anhydrase Inhibitors as Novel Drugs against Mycobacterial β-Carbonic Anhydrases: An Update on In Vitro and In Vivo Studies. Molecules, 2018, 23, 2911.	3.8	20

#	Article	IF	CITATIONS
1171	Evaluation of the anticancer potential of a sulphonamide carbonic anhydrase IX inhibitor on cervical cancer cells. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 703-711.	5.2	20
1172	Synthesis carbonic anhydrase enzyme inhibition and antioxidant activity of novel benzothiazole derivatives incorporating glycine, methionine, alanine, and phenylalanine moieties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 343-349.	5.2	20
1173	Design, synthesis, <i>inÂvitro</i> inhibition and toxicological evaluation of human carbonic anhydrases I, II and IX inhibitors in 5-nitroimidazole series. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 109-117.	5.2	20
1174	Catechols: a new class of carbonic anhydrase inhibitors. Chemical Communications, 2020, 56, 13033-13036.	4.1	20
1175	S-substituted 2-mercaptoquinazolin-4(3H)-one and 4-ethylbenzensulfonamides act as potent and selective human carbonic anhydrase IX and XII inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 733-743.	5.2	20
1176	Combining carbonic anhydrase and thioredoxin reductase inhibitory motifs within a single molecule dramatically increases its cytotoxicity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 665-671.	5.2	20
1177	Novel triazole-sulfonamide bearing pyrimidine moieties with carbonic anhydrase inhibitory action: Design, synthesis, computational and enzyme inhibition studies. Bioorganic and Medicinal Chemistry Letters, 2021, 48, 128249.	2.2	20
1178	Application of the dual-tail approach for the design and synthesis of novel Thiopyrimidine–Benzenesulfonamide hybrids as selective carbonic anhydrase inhibitors. European Journal of Medicinal Chemistry, 2022, 228, 114004.	5.5	20
1179	Inhibition of carbonic anhydrases IX/XII by SLC-0111 boosts cisplatin effects in hampering head and neck squamous carcinoma cell growth and invasion. Journal of Experimental and Clinical Cancer Research, 2022, 41, 122.	8.6	20
1180	Complexes With Biologically Active Ligands. Part 61 Ni(II) Coordination Compounds of Hydrazine and Heterocyclic Sulfonamides as Inhibitors of the Zinc Enzyme Carbonic Anhydrase. Metal-Based Drugs, 1996, 3, 143-148.	3.8	19
1181	Carbonic anhydrase inhibitors. Selective inhibition of human tumor-associated isozymes IX and XII and cytosolic isozymes I and II with some substituted-2-mercapto-benzenesulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2006, 21, 563-568.	5.2	19
1182	Carbonic anhydrase activators: Activation of the β-carbonic anhydrases from the pathogenic fungi Candida albicans and Cryptococcus neoformans with amines and amino acids. Bioorganic and Medicinal Chemistry, 2010, 18, 1034-1037.	3.0	19
1183	Carbonic anhydrase activators: Activation of the β-carbonic anhydrase from the pathogenic yeast Candida glabrata with amines and amino acids. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 1701-1704.	2.2	19
1184	Characterization, bioinformatic analysis and dithiocarbamate inhibition studies of two new α-carbonic anhydrases, CAH1 and CAH2, from the fruit fly Drosophila melanogaster. Bioorganic and Medicinal Chemistry, 2013, 21, 1516-1521.	3.0	19
1185	Biochemical characterization of the chloroplastic β -carbonic anhydrase from <i>Flaveria bidentis</i> (L.) "Kuntze― Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 500-504.	5.2	19
1186	Hit Recycling: Discovery of a Potent Carbonic Anhydrase Inhibitor by <i>in Silico</i> Target Fishing. ACS Chemical Biology, 2015, 10, 1964-1969.	3.4	19
1187	New 4-[(3-cyclohexyl-4-aryl-2,3-dihydro-1,3-thiazol-2-ylidene)amino]benzene-1-sulfonamides, synthesis and inhibitory activity toward carbonic anhydrase I, II, IX, XII. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 3281-3284.	2.2	19
1188	A new affinity gel for the purification of α -carbonic anhdrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 224-228.	5.2	19

#	Article	IF	CITATIONS
1189	CO2 and HCO3- Permeability of the Rat Liver Mitochondrial Membrane. Cellular Physiology and Biochemistry, 2016, 39, 2014-2024.	1.6	19
1190	Discovery and microassay of a nitrite-dependent carbonic anhydrase activity by stable-isotope dilution gas chromatography–mass spectrometry. Amino Acids, 2016, 48, 245-255.	2.7	19
1191	Activation studies of the α- and β-carbonic anhydrases from the pathogenic bacterium <i>Vibrio cholerae</i> with amines and amino acids. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 227-233.	5.2	19
1192	The Î ³ -carbonic anhydrase from the pathogenic bacterium Vibrio cholerae is potently activated by amines and amino acids. Bioorganic Chemistry, 2018, 77, 1-5.	4.1	19
1193	Novel thiazolidinone-containing compounds, without the well-known sulphonamide zinc-binding group acting as human carbonic anhydrase IX inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1299-1308.	5.2	19
1194	Selenides bearing benzenesulfonamide show potent inhibition activity against carbonic anhydrases from pathogenic bacteria Vibrio cholerae and Burkholderia pseudomallei. Bioorganic Chemistry, 2018, 79, 319-322.	4.1	19
1195	Benzamide-4-Sulfonamides Are Effective Human Carbonic Anhydrase I, II, VII, and IX Inhibitors. Metabolites, 2018, 8, 37.	2.9	19
1196	Novel sulfonamides incorporating 1,3,5-triazine and amino acid structural motifs as inhibitors of the physiological carbonic anhydrase isozymes I, II and IV and tumor-associated isozyme IX. Bioorganic Chemistry, 2018, 81, 241-252.	4.1	19
1197	Inhibition of carbonic anhydrases by a substrate analog: benzyl carbamate directly coordinates the catalytic zinc ion mimicking bicarbonate binding. Chemical Communications, 2018, 54, 10312-10315.	4.1	19
1198	Bis-benzoxaboroles: Design, Synthesis, and Biological Evaluation as Carbonic Anhydrase Inhibitors. ACS Medicinal Chemistry Letters, 2019, 10, 1205-1210.	2.8	19
1199	Application of hydrazino and hydrazido linkers to connect benzenesulfonamides with hydrophilic/phobic tails for targeting the middle region of human carbonic anhydrases active site: Selective inhibitors of hCA IX. European Journal of Medicinal Chemistry, 2019, 179, 547-556.	5.5	19
1200	Synthesis, cytotoxicities, and carbonic anhydrase inhibition potential of 6-(3-aryl-2-propenoyl)-2(<i>3H</i>)-benzoxazolones. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1722-1729.	5.2	19
1201	A potentiated cooperation of carbonic anhydrase IX and histone deacetylase inhibitors against cancer. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 391-397.	5.2	19
1202	Human carbonic anhydrases and post-translational modifications: a hidden world possibly affecting protein properties and functions. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1450-1461.	5.2	19
1203	Biochemical and structural characterisation of a protozoan beta-carbonic anhydrase from <i>Trichomonas vaginalis</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1292-1299.	5.2	19
1204	Anion inhibition studies of the Zn(II)-bound ι-carbonic anhydrase from the Gram-negative bacterium <i>Burkholderia territorii</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 372-376.	5.2	19
1205	Novel benzenesulfonamides aryl and arylsulfone conjugates adopting tail/dual tail approaches: Synthesis, carbonic anhydrase inhibitory activity and molecular modeling studies. European Journal of Medicinal Chemistry, 2021, 221, 113486.	5.5	19
1206	An Update on Natural Products with Carbonic Anhydrase Inhibitory Activity. Current Pharmaceutical Design, 2016, 22, 1570-1591.	1.9	19

#	Article	IF	CITATIONS
1207	The three-tails approach as a new strategy to improve selectivity of action of sulphonamide inhibitors against tumour-associated carbonic anhydrase IX and XII. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 930-939.	5.2	19
1208	Anticancer carbonic anhydrase inhibitors: a patent and literature update 2018-2022. Expert Opinion on Therapeutic Patents, 2022, 32, 833-847.	5.0	19
1209	Carbonic anhydrase inhibitors. Inhibition of isozymes I, II, IV, V and IX with complex fluorides, chlorides and cyanides. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 1909-1913.	2.2	18
1210	QSAR study on carbonic anhydrase inhibitors: water-soluble sulfonamides incorporating β-alanyl moieties, possessing long lasting-intra ocular pressure lowering properties—a molecular connectivity approach. European Journal of Medicinal Chemistry, 2005, 40, 1002-1012.	5.5	18
1211	Carbonic anhydrase inhibitors: Transepithelial transport of thioureido sulfonamide inhibitors of the cancer-associated isozyme IX is dependent on efflux transporters. Bioorganic and Medicinal Chemistry, 2006, 14, 2418-2427.	3.0	18
1212	Integrated Approach Using Protein and Ligand Information to Analyze Selectivity- and Affinity-Determining Features of Carbonic Anhydrase Isozymes. ChemMedChem, 2006, 1, 839-853.	3.2	18
1213	Carbonic anhydrase inhibitors. Diazenylbenzenesulfonamides are potent and selective inhibitors of the tumor-associated isozymes IX and XII over the cytosolic isoforms I and II. Bioorganic and Medicinal Chemistry, 2009, 17, 7093-7099.	3.0	18
1214	A thiabendazole sulfonamide shows potent inhibitory activity against mammalian and nematode α-carbonic anhydrases. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 1371-1375.	2.2	18
1215	3-Phenyl-1H-Indole-5-Sulfonamides: Structure-Based Drug Design of a Promising Class of Carbonic Anhydrase Inhibitors. Current Pharmaceutical Design, 2010, 16, 3317-3326.	1.9	18
1216	Synthesis and biological profile of new 1,2,3,4-tetrahydroisoquinolines as selective carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry, 2011, 19, 7003-7007.	3.0	18
1217	(R)-/(S)-10-Camphorsulfonyl-substituted aromatic/heterocyclic sulfonamides selectively inhibit mitochondrial over cytosolic carbonic anhydrases. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 1334-1337.	2.2	18
1218	The role of carbonic anhydrase IX in hypoxia control in OSCC. Journal of Oral Pathology and Medicine, 2013, 42, 1-8.	2.7	18
1219	Carbonic anhydrase inhibitors. Benzenesulfonamides incorporating cyanoacrylamide moieties strongly inhibit Saccharomyces cerevisiae β-carbonic anhydrase. Bioorganic and Medicinal Chemistry Letters, 2013, 23, 3570-3575.	2.2	18
1220	Carbonic anhydrase inhibitors: Synthesis and inhibition of the cytosolic mammalian carbonic anhydrase isoforms I, II and VII with benzene sulfonamides incorporating 4,5,6,7-tetrachlorophthalimide moiety. Bioorganic and Medicinal Chemistry, 2013, 21, 5168-5174.	3.0	18
1221	Inhibition of human carbonic anhydrase isoforms l–XIV with sulfonamides incorporating fluorine and 1,3,5-triazine moieties. Bioorganic and Medicinal Chemistry, 2013, 21, 6929-6936.	3.0	18
1222	Natural product hybrid and its superacid synthesized analogues: Dodoneine and its derivatives show selective inhibition of carbonic anhydrase isoforms I, III, XIII and XIV. Bioorganic and Medicinal Chemistry, 2013, 21, 3790-3794.	3.0	18
1223	Superacid synthesized tertiary benzenesulfonamides and benzofuzed sultams act as selective hCA IX inhibitors: toward understanding a new mode of inhibition by tertiary sulfonamides. Organic and Biomolecular Chemistry, 2013, 11, 7540.	2.8	18
1224	Tumor Microenvironmental Changes Induced by the Sulfamate Carbonic Anhydrase IX Inhibitor S4 in a Laryngeal Tumor Model. PLoS ONE, 2014, 9, e108068.	2.5	18

#	Article	IF	CITATIONS
1225	Ferrier sulfamidoglycosylation of glycals catalyzed by nitrosonium tetrafluoroborate: Towards new carbonic anhydrase glycoinhibitors. Bioorganic and Medicinal Chemistry, 2014, 22, 6353-6359.	3.0	18
1226	Carbonic anhydrase inhibitors. Synthesis of a novel series of 5-substituted 2,4-dichlorobenzenesulfonamides and their inhibition of human cytosolic isozymes I and II and the transmembrane tumor-associated isozymes IX and XII. European Journal of Medicinal Chemistry, 2014, 82, 47-55.	5.5	18
1227	Anion inhibition studies of two α-carbonic anhydrases from Lotus japonicus, LjCAA1 and LjCAA2. Journal of Inorganic Biochemistry, 2014, 136, 67-72.	3.5	18
1228	5-Aryl-1H-pyrazole-3-carboxylic acids as selective inhibitors of human carbonic anhydrases IX and XII. Bioorganic and Medicinal Chemistry, 2015, 23, 4649-4659.	3.0	18
1229	Carbonic anhydrase IX correlates with survival and is a potential therapeutic target for neuroblastoma. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1-6.	5.2	18
1230	Peptidomimetics as protein arginine deiminase 4 (PAD4) inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 466-471.	5.2	18
1231	Synthesis and carbonic anhydrase I, II, IV and XII inhibitory properties of N-protected amino acid – sulfonamide conjugates. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1476-1483.	5.2	18
1232	Recombinant thermoactive phosphoenolpyruvate carboxylase (PEPC) from Thermosynechococcus elongatus and its coupling with mesophilic/thermophilic bacterial carbonic anhydrases (CAs) for the conversion of CO2 to oxaloacetate. Bioorganic and Medicinal Chemistry, 2016, 24, 220-225.	3.0	18
1233	Sulfonamides incorporating heteropolycyclic scaffolds show potent inhibitory action against carbonic anhydrase isoforms I, II, IX and XII. Bioorganic and Medicinal Chemistry, 2016, 24, 921-927.	3.0	18
1234	The synthesis of (<i>Z</i>)-4-oxo-4-(arylamino)but-2-enoic acids derivatives and determination of their inhibition properties against human carbonic anhydrase I and II isoenzymes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 939-945.	5.2	18
1235	Lead Development of Thiazolylsulfonamides with Carbonic Anhydrase Inhibitory Action. Journal of Medicinal Chemistry, 2017, 60, 3154-3164.	6.4	18
1236	Advances in new psychoactive substances identification: the U.R.I.To.N. Consortium. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 841-849.	5.2	18
1237	Primary mono- and bis-sulfonamides obtained via regiospecific sulfochlorination of N-arylpyrazoles: inhibition profile against a panel of human carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 920-934.	5.2	18
1238	A one-step procedure for immobilising the thermostable carbonic anhydrase (SspCA) on the surface membrane of Escherichia coli. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1120-1128.	5.2	18
1239	Activation studies with amines and amino acids of the β-carbonic anhydrase from the pathogenic protozoan Leishmania donovani chagasi. Bioorganic Chemistry, 2018, 78, 406-410.	4.1	18
1240	The first activation study of a l´-carbonic anhydrase: TweCAl´ from the diatom <i>Thalassiosira weissflogii</i> is effectively activated by amines and amino acids. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 680-685.	5.2	18
1241	Tuning the Dual Inhibition of Carbonic Anhydrase and Cyclooxygenase by Dihydrothiazole Benzensulfonamides. ACS Medicinal Chemistry Letters, 2018, 9, 1045-1050.	2.8	18
1242	Inhibition of α-, β-, γ-, and δ-carbonic anhydrases from bacteria and diatoms with <i>N′</i> -aryl- <i>N</i> -hydroxy-ureas. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1194-1198.	5.2	18

#	Article	IF	CITATIONS
1243	Identification of Bivalent Ligands with Melatonin Receptor Agonist and Fatty Acid Amide Hydrolase (FAAH) Inhibitory Activity That Exhibit Ocular Hypotensive Effect in the Rabbit. Journal of Medicinal Chemistry, 2018, 61, 7902-7916.	6.4	18
1244	4-Substituted Benzenesulfonamides Incorporating Bi/Tricyclic Moieties Act as Potent and Isoform-Selective Carbonic Anhydrase II/IX Inhibitors. Journal of Medicinal Chemistry, 2018, 61, 5765-5770.	6.4	18
1245	Diagnostic markers for glaucoma: a patent and literature review (2013-2019). Expert Opinion on Therapeutic Patents, 2019, 29, 829-839.	5.0	18
1246	Organoruthenium(II) complexes of acetazolamide potently inhibit human carbonic anhydrase isoforms I, II, IX and XII. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 388-393.	5.2	18
1247	Appraisal of anti-protozoan activity of nitroaromatic benzenesulfonamides inhibiting carbonic anhydrases from <i>Trypanosoma cruzi</i> and <i>Leishmania donovani</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1164-1171.	5.2	18
1248	Polypharmacology of epacadostat: a potent and selective inhibitor of the tumor associated carbonic anhydrases IX and XII. Chemical Communications, 2019, 55, 5720-5723.	4.1	18
1249	α,γ-Diketocarboxylic Acids and Their Esters Act as Carbonic Anhydrase IX and XII Selective Inhibitors. ACS Medicinal Chemistry Letters, 2019, 10, 661-665.	2.8	18
1250	Development of oxathiino[6,5-b]pyridine 2,2-dioxide derivatives as selective inhibitors of tumor-related carbonic anhydrases IX and XII. European Journal of Medicinal Chemistry, 2020, 200, 112300.	5.5	18
1251	The Effect of Substituted Benzene-Sulfonamides and Clinically Licensed Drugs on the Catalytic Activity of CynT2, a Carbonic Anhydrase Crucial for Escherichia coli Life Cycle. International Journal of Molecular Sciences, 2020, 21, 4175.	4.1	18
1252	New thiopyrimidine-benzenesulfonamide conjugates as selective carbonic anhydrase II inhibitors: synthesis, in vitro biological evaluation, and molecular docking studies. Bioorganic and Medicinal Chemistry, 2020, 28, 115329.	3.0	18
1253	Sulfonamide Inhibition Profile of the β-Carbonic Anhydrase from Malassezia restricta, An Opportunistic Pathogen Triggering Scalp Conditions. Metabolites, 2020, 10, 39.	2.9	18
1254	Ninhydrins inhibit carbonic anhydrases directly binding to the metal ion. European Journal of Medicinal Chemistry, 2021, 209, 112875.	5.5	18
1255	Effect of Sulfonamides and Their Structurally Related Derivatives on the Activity of Î1-Carbonic Anhydrase from Burkholderia territorii. International Journal of Molecular Sciences, 2021, 22, 571.	4.1	18
1256	Natural inspired piperine-based sulfonamides and carboxylic acids as carbonic anhydrase inhibitors: Design, synthesis and biological evaluation. European Journal of Medicinal Chemistry, 2021, 225, 113800.	5.5	18
1257	Selective inhibition of carbonic anhydrase IX and XII by coumarin and psoralen derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 685-692.	5.2	18
1258	Inhibition studies of bacterial α-carbonic anhydrases with phenols. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 666-671.	5.2	18
1259	Carbonic Anhydrase Inhibitors:N-Cyanosulfonamides, a new Class of High Affinity Isozyme II and IV Inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 1999, 14, 289-306.	0.5	17
1260	Carbonic Anhydrase Inhibitors. Part 91. Metal Complexes of Heterocyclic Sulfonamides as Potential Pharmacological Agents in the Treatment of Gastric Acid Secretion Imbalances. Metal-Based Drugs, 2000, 7, 57-62.	3.8	17

#	Article	IF	CITATIONS
1261	Carbonic anhydrase inhibitors: The inhibition profiles of the human mitochondrial isoforms VA and VB with anions are very different. Bioorganic and Medicinal Chemistry, 2007, 15, 6742-6747.	3.0	17
1262	Modification of carbonic anhydrase II with acetaldehyde, the first metabolite of ethanol, leads to decreased enzyme activity. BMC Biochemistry, 2008, 9, 32.	4.4	17
1263	Synthesis of a new series of N4-substituted 4-(2-aminoethyl)benzenesulfonamides and their inhibitory effect on human carbonic anhydrase cytosolic isozymes I and II and transmembrane tumor-associated isozymes IX and XII. European Journal of Medicinal Chemistry, 2014, 84, 59-67.	5.5	17
1264	Flow synthesis and biological activity of aryl sulfonamides as selective carbonic anhydrase IX and XII inhibitors. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 3422-3425.	2.2	17
1265	Benzenesulfonamides incorporating bulky aromatic/heterocyclic tails with potent carbonic anhydrase inhibitory activity. Bioorganic and Medicinal Chemistry, 2015, 23, 7751-7764.	3.0	17
1266	Synthesis 4-[2-(2-mercapto-4-oxo-4H-quinazolin-3-yl)-ethyl]-benzenesulfonamides with subnanomolar carbonic anhydrase II and XII inhibitory properties. Bioorganic and Medicinal Chemistry, 2016, 24, 4100-4107.	3.0	17
1267	Dithiocarbamates with potent inhibitory activity against the <i>Saccharomyces cerevisiae</i> β -carbonic anhydrase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 132-136.	5.2	17
1268	Human carbonic anhydrase inhibitory profile of mono- and bis-sulfonamides synthesized via a direct sulfochlorination of 3- and 4-(hetero)arylisoxazol-5-amine scaffolds. Bioorganic and Medicinal Chemistry, 2017, 25, 1914-1925.	3.0	17
1269	Disclosing the Interaction of Carbonic Anhydrase IX with Cullin-Associated NEDD8-Dissociated Protein 1 by Molecular Modeling and Integrated Binding Measurements. ACS Chemical Biology, 2017, 12, 1460-1465.	3.4	17
1270	Five- and Six-Membered Nitrogen-Containing Compounds as Selective Carbonic Anhydrase Activators. Molecules, 2017, 22, 2178.	3.8	17
1271	Plasmatic carbonic anhydrase IX as a diagnostic marker for clear cell renal cell carcinoma. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 234-240.	5.2	17
1272	Synthesis of novel 5-amino-1,3,4-thiadiazole-2-sulfonamide containing acridine sulfonamide/carboxamide compounds and investigation of their inhibition effects on human carbonic anhydrase I, II, IV and VII. Bioorganic Chemistry, 2018, 77, 101-105.	4.1	17
1273	Mono- and di-thiocarbamate inhibition studies of the δ-carbonic anhydrase TweCAδ from the marine diatom <i>Thalassiosira weissflogii</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 707-713.	5.2	17
1274	Unprotected primary sulfonamide group facilitates ring-forming cascade en route to polycyclic [1,4]oxazepine-based carbonic anhydrase inhibitors. Bioorganic Chemistry, 2018, 76, 140-146.	4.1	17
1275	Sulphonamide inhibition studies of the β-carbonic anhydrase from the bacterial pathogen <i>Clostridium perfringens</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 31-36.	5.2	17
1276	Discovery of potent anti-convulsant carbonic anhydrase inhibitors: Design, synthesis, inÂvitro and inÂvivo appraisal. European Journal of Medicinal Chemistry, 2018, 156, 430-443.	5.5	17
1277	Synthesis of novel dipeptide sulfonamide conjugates with effective carbonic anhydrase I, II, IX, and XII inhibitory properties. Bioorganic Chemistry, 2018, 81, 311-318.	4.1	17

1278 Human carbonic anhydrases. , 2019, , 151-185.

#	Article	IF	CITATIONS
1279	<i>Phaeodactylum tricornutum</i> as a model organism for testing the membrane penetrability of sulphonamide carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 510-518.	5.2	17
1280	A novel small molecule that kills a subset of MLL-rearranged leukemia cells by inducing mitochondrial dysfunction. Oncogene, 2019, 38, 3824-3842.	5.9	17
1281	Synthesis and biological evaluation of novel 8-substituted quinoline-2-carboxamides as carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1172-1177.	5.2	17
1282	Inhibition of bacterial α-, β- and γ-class carbonic anhydrases with selenazoles incorporating benzenesulfonamide moieties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 244-249.	5.2	17
1283	Anion Inhibition Studies of the Beta-Carbonic Anhydrase from Escherichia coli. Molecules, 2020, 25, 2564.	3.8	17
1284	Benzylaminoethyureido-Tailed Benzenesulfonamides: Design, Synthesis, Kinetic and X-ray Investigations on Human Carbonic Anhydrases. International Journal of Molecular Sciences, 2020, 21, 2560.	4.1	17
1285	Anion inhibition studies of the α-carbonic anhydrases from <i>Neisseria gonorrhoeae</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1061-1066.	5.2	17
1286	Discovery of Potent Carbonic Anhydrase Inhibitors as Effective Anticonvulsant Agents: Drug Design, Synthesis, and In Vitro and In Vivo Investigations. Journal of Medicinal Chemistry, 2021, 64, 3100-3114.	6.4	17
1287	Modulating the Efficacy of Carbonic Anhydrase Inhibitors through Fluorine Substitution. Angewandte Chemie - International Edition, 2021, 60, 23068-23082.	13.8	17
1288	Carbonic Anhydrase Inhibitors. Metal Complexes of 5-(2-Chlorophenyl)-1, 3, 4-Thiadiazole-2-Sulfonamide with Topical Intraocular Pressure Lowering Properties: The Influence of Metal Ions Upon the Pharmacological Activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2000, 15, 185-200.	0.5	16
1289	Antimycobacterial Activity of 3,4-dichlorophenyl-ureas, N,N-diphenyl-ureas and Related Derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2001, 16, 425-432.	0.5	16
1290	Cyclodextrin Complexes of Sulfonamide Carbonic Anhydrase IOnhibitors As Longâ€lasting Topically Acting Antiglaucoma Agents. Journal of Pharmaceutical Sciences, 2002, 91, 2211-2219.	3.3	16
1291	Carbonic anhydrase inhibitors: inhibition of human cytosolic isozyme II and mitochondrial isozyme V with a series of benzene sulfonamide derivatives. Bioorganic and Medicinal Chemistry Letters, 2004, 14, 5703-5707.	2.2	16
1292	Novel use of chemical shift in NMR as molecular descriptor: a first report on modeling carbonic anhydrase inhibitory activity and related parameters. Bioorganic and Medicinal Chemistry Letters, 2005, 15, 931-936.	2.2	16
1293	Carbonic anhydrase inhibitors: Design of spin-labeled sulfonamides incorporating TEMPO moieties as probes for cytosolic or transmembrane isozymes. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 3475-3480.	2.2	16
1294	Carbonic anhydrase inhibitors. Synthesis of 2,4,6-trimethylpyridinium derivatives of 2-(hydrazinocarbonyl)-3-aryl-1H-indole-5-sulfonamides acting as potent inhibitors of the tumor-associated isoform IX and XII. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 2931-2934.	2.2	16
1295	Carbonic anhydrase inhibitors. The nematode α-carbonic anhydrase of Caenorhabditis elegans CAH-4b is highly inhibited by 2-(hydrazinocarbonyl)-3-substituted-phenyl-1H-indole-5-sulfonamides. Bioorganic and Medicinal Chemistry, 2009, 17, 3212-3215.	3.0	16
1296	New hydroxypyrimidinone-containing sulfonamides as carbonic anhydrase inhibitors also acting as MMP inhibitors. Bioorganic and Medicinal Chemistry Letters, 2010, 20, 3623-3627.	2.2	16

#	Article	IF	CITATIONS
1297	Inhibition of V-ATPase and Carbonic Anhydrases as Interference Strategy with Tumor Acidification Processes. Current Pharmaceutical Design, 2012, 18, 1407-1413.	1.9	16
1298	Dominant behaviours in the expression of human carbonic anhydrase hCA I activity. Chemical Communications, 2014, 50, 8043-8046.	4.1	16
1299	3D QSAR studies, pharmacophore modeling, and virtual screening of diarylpyrazole–benzenesulfonamide derivatives as a template to obtain new inhibitors, using human carbonic anhydrase II as a model protein. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32. 688-700.	5.2	16
1300	Anion inhibition profiles of the Î ³ -carbonic anhydrase from the pathogenic bacterium Burkholderia pseudomallei responsible of melioidosis and highly drug resistant to common antibiotics. Bioorganic and Medicinal Chemistry, 2017, 25, 575-580.	3.0	16
1301	"Seriously Sweetâ€ŧ Acesulfame K Exhibits Selective Inhibition Using Alternative Binding Modes in Carbonic Anhydrase Isoforms. Journal of Medicinal Chemistry, 2018, 61, 1176-1181.	6.4	16
1302	Activation studies with amines and amino acids of the β-carbonic anhydrase encoded by the <i>Rv3273</i> gene from the pathogenic bacterium <i>Mycobacterium tuberculosis</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 364-369.	5.2	16
1303	Synthesis of a new series of 3-functionalised-1-phenyl-1,2,3-triazole sulfamoylbenzamides as carbonic anhydrase I, II, IV and IX inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1199-1209.	5.2	16
1304	Synthesis and selective inhibitory effects of some 2-oxindole benzenesulfonamide conjugates on human carbonic anhydrase isoforms CA I, CA II, CA IX and CAXII. Bioorganic Chemistry, 2020, 95, 103514.	4.1	16
1305	Novel benzofuran-based sulphonamides as selective carbonic anhydrases IX and XII inhibitors: synthesis and <i>inÂvitro</i> biological evaluation. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 298-305.	5.2	16
1306	Phenyl(thio)phosphon(amid)ate Benzenesulfonamides as Potent and Selective Inhibitors of Human Carbonic Anhydrases II and VII Counteract Allodynia in a Mouse Model of Oxaliplatin-Induced Neuropathy. Journal of Medicinal Chemistry, 2020, 63, 5185-5200.	6.4	16
1307	Response to Perspectives on the Classical Enzyme Carbonic Anhydrase and the Search for Inhibitors. Biophysical Journal, 2021, 120, 178-181.	0.5	16
1308	Dual Carbonic Anhydrase IX/XII Inhibitors and Carbon Monoxide Releasing Molecules Modulate LPS-Mediated Inflammation in Mouse Macrophages. Antioxidants, 2021, 10, 56.	5.1	16
1309	Investigation of 3-sulfamoyl coumarins against cancer-related IX and XII isoforms of human carbonic anhydrase as well as cancer cells leads to the discovery of 2-oxo-2H-benzo[h]chromene-3-sulfonamide – A new caspase-activating proapoptotic agent. European Journal of Medicinal Chemistry, 2021, 222, 113589.	5.5	16
1310	Synthesis, biological evaluation, and in silico studies of potential activators of apoptosis and carbonic anhydrase inhibitors on isatin-5-sulfonamide scaffold. European Journal of Medicinal Chemistry, 2022, 228, 113997.	5.5	16
1311	Pharmaceutical strategies for preventing toxicity and promoting antioxidant and anti-inflammatory actions of bilirubin. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 487-501.	5.2	16
1312	Development of 4-((3-oxo-3-phenylpropyl)amino)benzenesulfonamide derivatives utilizing tail/dual-tail approaches as novel carbonic anhydrase inhibitors. European Journal of Medicinal Chemistry, 2022, 238, 114412.	5.5	16
1313	CARBONIC ANHYDRASE INHIBITORS. Part 32. ISOZYME II INHIBITION WITH ORGANOPHOSPHORIC COMPOUNDS CONTAINING SUBSTITUTED SULFONAMIDO MOIETIES. Main Group Metal Chemistry, 1995, 18, .	1.6	15
1314	Carbonic anhydrase inhibitors. Part 79. European Journal of Pharmaceutical Sciences, 1999, 9, 185-199.	4.0	15

#	Article	IF	CITATIONS
1315	Carbonic Anhydrase Activators: Synthesis of High Affinity Isozymes I, II and IV Activators, Derivatives of 4-(AryIsulfonylureido-Amino AcyI)Ethyl-1H-Imidazole. Journal of Enzyme Inhibition and Medicinal Chemistry, 2000, 15, 471-486.	0.5	15
1316	Carbonic anhydrase inhibitors: The X-ray crystal structure of the adduct of N-hydroxysulfamide with isozyme II explains why this new zinc binding function is effective in the design of potent inhibitors. Bioorganic and Medicinal Chemistry Letters, 2007, 17, 2795-2801.	2.2	15
1317	Fluorescence- and Spin-Labeled Carbonic Anhydrase Inhibitors. Current Pharmaceutical Design, 2008, 14, 699-707.	1.9	15
1318	Carbonic anhydrase inhibitors: The membrane-associated isoform XV is highly inhibited by inorganic anions. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 1155-1158.	2.2	15
1319	Monoclonal antibodies raised against 167–180 aa sequence of human carbonic anhydrase XII inhibit its enzymatic activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 804-810.	5.2	15
1320	Kinetic characterization of 4,4′-biphenylsulfonamides as selective non-zinc binding MMP inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 947-954.	5.2	15
1321	Synthesis and carbonic anhydrase I, II, IX and XII inhibitory activity of sulfamates incorporating piperazinyl-ureido moieties. Bioorganic and Medicinal Chemistry, 2015, 23, 5619-5625.	3.0	15
1322	Kinetic and X-ray crystallographic investigations of substituted 2-thio-6-oxo-1,6-dihydropyrimidine–benzenesulfonamides acting as carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry, 2016, 24, 3643-3648.	3.0	15
1323	The human carbonic anhydrase isoenzymes I and II inhibitory effects of some hydroperoxides, alcohols, and acetates. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1248-1253.	5.2	15
1324	Synthesis and inhibition potency of novel ureido benzenesulfonamides incorporating GABA as tumor-associated carbonic anhydrase IX and XII inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 205-211.	5.2	15
1325	Carbonic anhydrase from <i>Apis mellifera</i> : purification and inhibition by pesticides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 47-50.	5.2	15
1326	Comparison of the amine/amino acid activation profiles of the β- and γ-carbonic anhydrases from the pathogenic bacterium <i>Burkholderia pseudomallei</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 25-30.	5.2	15
1327	Discovering a new class of antifungal agents that selectively inhibits microbial carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1537-1544.	5.2	15
1328	Advances in microwave-assisted synthesis and the impact of novel drug discovery. Expert Opinion on Drug Discovery, 2018, 13, 861-873.	5.0	15
1329	CAIX furthers tumour progression in the hypoxic tumour microenvironment of esophageal carcinoma and is a possible therapeutic target. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1024-1033.	5.2	15
1330	Synthesis and comparative carbonic anhydrase inhibition of new Schiff's bases incorporating benzenesulfonamide, methanesulfonamide, and methylsulfonylbenzene scaffolds. Bioorganic Chemistry, 2019, 92, 103225.	4.1	15
1331	Click-tailed benzenesulfonamides as potent bacterial carbonic anhydrase inhibitors for targeting Mycobacterium tuberculosis and Vibrio cholerae. Bioorganic Chemistry, 2019, 86, 183-186.	4.1	15
1332	N-aryl-N'-ureido-O-sulfamates: Potent and selective inhibitors of the human Carbonic Anhydrase VII isoform with neuropathic pain relieving properties. Bioorganic Chemistry, 2019, 89, 103033.	4.1	15

#	Article	IF	CITATIONS
1333	Extrinsic acidosis suppresses glycolysis and migration while increasing network formation in pulmonary microvascular endothelial cells. American Journal of Physiology - Lung Cellular and Molecular Physiology, 2019, 317, L188-L201.	2.9	15
1334	Novel Re(I) tricarbonyl coordination compounds based on 2-pyridyl-1,2,3-triazole derivatives bearing a 4-amino-substituted benzenesulfonamide arm: synthesis, crystal structure, computational studies and inhibitory activity against carbonic anhydrase I, II, and IX isoformsâ€. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 773-782.	5.2	15
1335	Aryl derivatives of 3H-1,2-benzoxathiepine 2,2-dioxide as carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 245-254.	5.2	15
1336	Sulfonamide/sulfamate switch with a series of piperazinylureido derivatives: Synthesis, kinetic and in silico evaluation as carbonic anhydrase isoforms I, II, IV, and IX inhibitors. European Journal of Medicinal Chemistry, 2020, 186, 111896.	5.5	15
1337	Sulphonamide inhibition profile of <i>Staphylococcus aureus</i> β-carbonic anhydrase. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1834-1839.	5.2	15
1338	Appliance of the piperidinyl-hydrazidoureido linker to benzenesulfonamide compounds: Synthesis, in vitro and in silico evaluation of potent carbonic anhydrase II, IX and XII inhibitors. Bioorganic Chemistry, 2020, 98, 103728.	4.1	15
1339	Activation Effects of Carnosine- and Histidine-Containing Dipeptides on Human Carbonic Anhydrases: A Comprehensive Study. International Journal of Molecular Sciences, 2020, 21, 1761.	4.1	15
1340	Evaluation of Thio- and Seleno-Acetamides Bearing Benzenesulfonamide as Inhibitor of Carbonic Anhydrases from Different Pathogenic Bacteria. International Journal of Molecular Sciences, 2020, 21, 598.	4.1	15
1341	Synthesis of some N-aroyl-2-oxindole benzenesulfonamide conjugates with carbonic anhydrase inhibitory activity. Bioorganic Chemistry, 2020, 96, 103635.	4.1	15
1342	Development of Thiazolidinones as Fungal Carbonic Anhydrase Inhibitors. International Journal of Molecular Sciences, 2020, 21, 2960.	4.1	15
1343	Binding site comparison for coumarin inhibitors and amine/amino acid activators of human carbonic anhydrases. European Journal of Medicinal Chemistry, 2021, 226, 113875.	5.5	15
1344	Exploring of tumor-associated carbonic anhydrase isoenzyme IX and XII inhibitory effects and cytotoxicities of the novel N-aryl-1-(4-sulfamoylphenyl)-5-(thiophen-2-yl)-1H-pyrazole-3-carboxamides. Bioorganic Chemistry, 2021, 115, 105194.	4.1	15
1345	Microbiota, Bacterial Carbonic Anhydrases, and Modulators of Their Activity: Links to Human Diseases?. Mediators of Inflammation, 2021, 2021, 1-13.	3.0	15
1346	Discovery of 2,4-thiazolidinedione-tethered coumarins as novel selective inhibitors for carbonic anhydrase IX and XII isoforms. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 531-541.	5.2	15
1347	4-(3-Alkyl/benzyl-guanidino)benzenesulfonamides as selective carbonic anhydrase VII inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1568-1576.	5.2	15
1348	Thienothiopyransulfonamides as Complexing Agents for the Preparation of Dual Carbonic Anhydrase Inhibitors. Metal-Based Drugs, 1995, 2, 327-330.	3.8	14
1349	Carbonic anhydrase inhibitors – part 70. Synthesis and ocular pharmacology of a new class of water-soluble, topically effective intraocular pressure lowering agents derived from nicotinic acid and aromatic/heterocyclic sulfonamides. European Journal of Medicinal Chemistry, 1999, 34, 799-808.	5.5	14
1350	Carbonic Anhydrase Inhibitors With Strong Topical Antiglaucoma Properties Incorporating a 4-(2-amino-pyrimidin-4-yl-amino)-benzenesulfonamide Scaffold. Journal of Enzyme Inhibition and Medicinal Chemistry, 2002, 17, 9-18.	5.2	14

#	Article	IF	CITATIONS
1351	Carbonic Anhydrase Inhibitors: Inhibition of Cytosolic Carbonic Anhydrase Isozymes II and VII with Simple Aromatic Sulfonamides and Some Azo Dyes. Chemical Biology and Drug Design, 2009, 74, 196-202.	3.2	14
1352	Sulfonamides incorporating boroxazolidone moieties are potent inhibitors of the transmembrane, tumor-associated carbonic anhydrase isoforms IX and XII. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 2975-2979.	2.2	14
1353	Kinetic and in silico analysis of thiazolidin-based inhibitors of α-carbonic anhydrase isoenzymes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2013, 28, 370-374.	5.2	14
1354	Hydrophobic Substituents of the Phenylmethylsulfamide Moiety Can Be Used for the Development of New Selective Carbonic Anhydrase Inhibitors. BioMed Research International, 2014, 2014, 1-11.	1.9	14
1355	Multicomponent chemistry in the synthesis of carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 185-199.	5.2	14
1356	Inhibitory effects of benzimidazole containing new phenolic Mannich bases on human carbonic anhydrase isoforms hCA I and II. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1540-1544.	5.2	14
1357	Kinetic properties and affinities for sulfonamide inhibitors of an α-carbonic anhydrase (CruCA4) involved in coral biomineralization in the Mediterranean red coral Corallium rubrum. Bioorganic and Medicinal Chemistry, 2017, 25, 3525-3530.	3.0	14
1358	Synthesis of new 3-(2-mercapto-4-oxo-4H-quinazolin-3-yl)-benzenesulfonamides with strong inhibition properties against the tumor associated carbonic anhydrases IX and XII. Bioorganic and Medicinal Chemistry, 2017, 25, 2782-2788.	3.0	14
1359	1,3-Oxazole-based selective picomolar inhibitors of cytosolic human carbonic anhydrase II alleviate ocular hypertension in rabbits: Potency is supported by X-ray crystallography of two leads. Bioorganic and Medicinal Chemistry, 2017, 25, 4560-4565.	3.0	14
1360	Microwave assisted synthesis of novel tetrazole/sulfonamide derivatives based on octahydroacridine, xanthene and chromene skeletons as inhibitors of the carbonic anhydrases isoforms I, II, IV and VII. Bioorganic and Medicinal Chemistry Letters, 2017, 27, 86-89.	2.2	14
1361	Discovery of 4-sulfamoyl-phenyl-β-lactams as a new class of potent carbonic anhydrase isoforms I, II, IV and VII inhibitors: The first example of subnanomolar CA IV inhibitors. Bioorganic and Medicinal Chemistry, 2017, 25, 539-544.	3.0	14
1362	Synthesis and Biological Evaluation of 4‣ulfamoylphenyl/Sulfocoumarin Carboxamides as Selective Inhibitors of Carbonic Anhydrase Isoforms hCAâ€II, IX, and XII. ChemMedChem, 2018, 13, 1165-1171.	3.2	14
1363	Synthesis, structure and bioactivity of primary sulfamate-containing natural products. Bioorganic and Medicinal Chemistry Letters, 2018, 28, 3009-3013.	2.2	14
1364	Target-based drug discovery through inversion of quantitative structure-drug-property relationships and molecular simulation: CA IX-sulphonamide complexes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1430-1443.	5.2	14
1365	Potent and Selective Carboxylic Acid Inhibitors of Tumor-Associated Carbonic Anhydrases IX and XII. Molecules, 2018, 23, 17.	3.8	14
1366	Synthesis of novel benzenesulfamide derivatives with inhibitory activity against human cytosolic carbonic anhydrase I and II and <i>Vibrio cholerae</i> α- and β-class enzymes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1125-1136.	5.2	14
1367	Nitroimidazole-based inhibitors DTP338 and DTP348 are safe for zebrafish embryos and efficiently inhibit the activity of human CA IX in <i>Xenopus</i> oocytes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1064-1073.	5.2	14
1368	New anthranilic acid-incorporating N-benzenesulfonamidophthalimides as potent inhibitors of carbonic anhydrases I, II, IX, and XII: Synthesis, inÂvitro testing, and in silico assessment. European Journal of Medicinal Chemistry, 2019, 181, 111573.	5.5	14

#	Article	IF	CITATIONS
1369	Personalized Treatment Response Assessment for Rare Childhood Tumors Using Microcalorimetry–Exemplified by Use of Carbonic Anhydrase IX and Aquaporin 1 Inhibitors. International Journal of Molecular Sciences, 2019, 20, 4984.	4.1	14
1370	Syntesis of thio- and seleno-acetamides bearing benzenesulfonamide as potent inhibitors of human carbonic anhydrase II and XII. Bioorganic Chemistry, 2019, 89, 102984.	4.1	14
1371	An AGT-based <i>protein-tag</i> system for the labelling and surface immobilization of enzymes on <i>E. coli</i> outer membrane. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 490-499.	5.2	14
1372	<i>In vitro</i> inhibition of <i>Mycobacterium tuberculosis β</i> -carbonic anhydrase 3 with Mono- and dithiocarbamates and evaluation of their toxicity using zebrafish developing embryos. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 65-71.	5.2	14
1373	Novel insights on saccharin- and acesulfame-based carbonic anhydrase inhibitors: design, synthesis, modelling investigations and biological activity evaluation. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1891-1905.	5.2	14
1374	A Novel Inhibitor of Carbonic Anhydrases Prevents Hypoxia-Induced TNBC Cell Plasticity. International Journal of Molecular Sciences, 2020, 21, 8405.	4.1	14
1375	New coumarin/sulfocoumarin linked phenylacrylamides as selective transmembrane carbonic anhydrase inhibitors: Synthesis and in-vitro biological evaluation. Bioorganic and Medicinal Chemistry, 2020, 28, 115586.	3.0	14
1376	7-Acylamino-3H-1,2-benzoxathiepine 2,2-dioxides as new isoform-selective carbonic anhydrase IX and XII inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 650-656.	5.2	14
1377	Synthesis and Biological Evaluation of Imidazo[2,1-b]Thiazole based Sulfonyl Piperazines as Novel Carbonic Anhydrase II Inhibitors. Metabolites, 2020, 10, 136.	2.9	14
1378	Coumarinâ€Thiourea Hybrids Show Potent Carbonic Anhydrase IX and XIII Inhibitory Action. ChemMedChem, 2021, 16, 1252-1256.	3.2	14
1379	Hypoxia-activated prodrug derivatives of anti-cancer drugs: a patent review 2006 – 2021. Expert Opinion on Therapeutic Patents, 2022, 32, 1-12.	5.0	14
1380	Determination of intracellular protein–ligand binding affinity by competition binding in-cell NMR. Acta Crystallographica Section D: Structural Biology, 2021, 77, 1270-1281.	2.3	14
1381	Inhibition of α-, β- and γ-carbonic anhydrases from the pathogenic bacterium <i>Vibrio cholerae</i> with aromatic sulphonamides and clinically licenced drugs – a joint docking/molecular dynamics study. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 469-479.	5.2	14
1382	State of the Art on Carbonic Anhydrase Modulators for Biomedical Purposes. Current Medicinal Chemistry, 2019, 26, 2558-2573.	2.4	14
1383	Development of Novel Quinoline-Based Sulfonamides as Selective Cancer-Associated Carbonic Anhydrase Isoform IX Inhibitors. International Journal of Molecular Sciences, 2021, 22, 11119.	4.1	14
1384	First studies on tumor associated carbonic anhydrases IX and XII monoclonal antibodies conjugated to small molecule inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 592-596.	5.2	14
1385	Benzenesulfonamides with different rigidity-conferring linkers as carbonic anhydrase inhibitors: an insight into the antiproliferative effect on glioblastoma, pancreatic, and breast cancer cells. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1857-1869.	5.2	14
1386	Carbonic Anhydrase Inhibitors: Novel Compounds Containing S-NH Moieties: Sulfenamido-Sulfonamides, Sulfenimido-Sulfonamides and their Interaction with Isozymes I, II and IV. Journal of Enzyme Inhibition and Medicinal Chemistry, 1998, 13, 419-442.	0.5	13

#	Article	IF	CITATIONS
1387	Carbonic anhydrase inhibitors. Part 60##See ref.Â[1]. The topical intraocular pressure-lowering properties of metal complexes of a heterocyclic sulfonamide: influence of the metal ion upon biological activity. European Journal of Medicinal Chemistry, 1999, 34, 585-595.	5.5	13
1388	Carbonic Anhydrase Inhibitors, Interaction of Boron Derivatives with Isozymes I and II: A New Binding Site for Hydrophobic Inhibitors at the Entrance of the Active Site as shown by Docking Studies. Journal of Enzyme Inhibition and Medicinal Chemistry, 2001, 16, 125-133.	0.5	13
1389	Carbonic anhydrase inhibitors: possible anticancer drugs with a novel mechanism of action. Drug Development Research, 2008, 69, 297-303.	2.9	13
1390	Affinity of Sulfamates and Sulfamides to Carbonic Anhydrase II Isoform: Experimental and Molecular Modeling Approaches. Journal of Chemical Information and Modeling, 2010, 50, 1113-1122.	5.4	13
1391	Thiol–ene click chemistry for the synthesis of highly effective glycosyl sulfonamide carbonic anhydrase inhibitors. Chemical Communications, 2013, 49, 5699.	4.1	13
1392	Inhibition of carbonic anhydrase isoforms I, II, IX and XII with novel Schiff bases: Identification of selective inhibitors for the tumor-associated isoforms over the cytosolic ones. Bioorganic and Medicinal Chemistry, 2014, 22, 5883-5890.	3.0	13
1393	Cloning, characterization and anion inhibition studies of a Î ³ -carbonic anhydrase from the Antarctic cyanobacterium Nostoc commune. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 4970-4975.	2.2	13
1394	Inhibition of carbonic anhydrase isoforms I, II, IX and XII with Schiff's bases incorporating iminoureido moieties. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 901-907.	5.2	13
1395	Inhibition of β-carbonic anhydrases from Brucella suis with C-cinnamoyl glycosides incorporating the phenol moiety. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 1017-1020.	5.2	13
1396	A failed tentative to design a super carbonic anhydrase having the biochemical properties of the most thermostable CA (SspCA) and the fastest (SazCA) enzymes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 989-994.	5.2	13
1397	Dendrimers incorporating benzenesulfonamide moieties strongly inhibit carbonic anhydrase isoforms I–XIV. Organic and Biomolecular Chemistry, 2015, 13, 6453-6457.	2.8	13
1398	Dynameric host frameworks for the activation of lipase through H-bond and interfacial encapsulation. Chemical Communications, 2016, 52, 13768-13770.	4.1	13
1399	Influence of hypoxia-dependent factors on the progression of neuroblastoma. Pediatric Surgery International, 2016, 32, 187-192.	1.4	13
1400	Sulfonamide inhibition studies of the γ-carbonic anhydrase from the Antarctic bacterium Colwellia psychrerythraea. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 1253-1259.	2.2	13
1401	Interaction of anions with a newly characterized alpha carbonic anhydrase from <i>Halomonas</i> sp. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1119-1123.	5.2	13
1402	Multimeric xanthates as carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 946-952.	5.2	13
1403	Investigating the antiplasmodial activity of primary sulfonamide compounds identified in open source malaria data. International Journal for Parasitology: Drugs and Drug Resistance, 2017, 7, 61-70.	3.4	13
1404	Anion inhibitors of the β-carbonic anhydrase from the pathogenic bacterium responsible of tularemia, Francisella tularensis. Bioorganic and Medicinal Chemistry, 2017, 25, 4800-4804.	3.0	13

#	Article	IF	CITATIONS
1405	Protonography and anion inhibition profile of the α-carbonic anhydrase (CruCA4) identified in the Mediterranean red coral Corallium rubrum. Bioorganic Chemistry, 2018, 76, 281-287.	4.1	13
1406	Exponential Activation of Carbonic Anhydrase by Encapsulation in Dynameric Host Matrices with Chiral Discrimination. Chemistry - A European Journal, 2018, 24, 715-720.	3.3	13
1407	Dioxygen, an unexpected carbonic anhydrase ligand. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 999-1005.	5.2	13
1408	Extending the Î ³ -class carbonic anhydrases inhibition profiles with phenolic compounds. Bioorganic Chemistry, 2019, 93, 103336.	4.1	13
1409	Carbonic anhydrases. , 2019, , 3-16.		13
1410	Synthesis and exploration of 2-morpholino-4-phenylthiazol-5-yl acrylamide derivatives for their effects against carbonic anhydrase I, II, IX and XII isoforms as a non-sulfonamide class of inhibitors. Bioorganic and Medicinal Chemistry, 2019, 27, 115090.	3.0	13
1411	Fibrate-based <i>N</i> -acylsulphonamides targeting carbonic anhydrases: synthesis, biochemical evaluation, and docking studies. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1051-1061.	5.2	13
1412	5-Arylisothiazol-3(2H)-one-1,(1)-(di)oxides: A new class of selective tumor-associated carbonic anhydrases (hCA IX and XII) inhibitors. European Journal of Medicinal Chemistry, 2019, 175, 40-48.	5.5	13
1413	Novel 2-indolinones containing a sulfonamide moiety as selective inhibitors of <i>candida</i> β-carbonic anhydrase enzyme. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 528-531.	5.2	13
1414	1,2,4-Trisubstituted imidazolinones with dual carbonic anhydrase and p38 mitogen-activated protein kinase inhibitory activity. Bioorganic Chemistry, 2019, 82, 109-116.	4.1	13
1415	A structure-based approach towards the identification of novel antichagasic compounds: <i>Trypanosoma cruzi</i> carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 21-30.	5.2	13
1416	Benzimidazole derivatives as potent and isoform selective tumor-associated carbonic anhydrase IX/XII inhibitors. Bioorganic Chemistry, 2020, 95, 103544.	4.1	13
1417	Carbonic Anhydrase Activators. , 2004, , 317-352.		13
1418	Synthesis, molecular modelling and QSAR study of new <i>N-</i> phenylacetamide-2-oxoindole benzensulfonamide conjugates as carbonic anhydrase inhibitors with antiproliferative activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 701-717.	5.2	13
1419	Isocoumarins: a new class of selective carbonic anhydrase IX and XII inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 743-748.	5.2	13
1420	Biological investigation of <i>N</i> -methyl thiosemicarbazones as antimicrobial agents and bacterial carbonic anhydrases inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 986-993.	5.2	13
1421	Dithiocarbamates effectively inhibit the α-carbonic anhydrase from <i>Neisseria gonorrhoeae</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1-8.	5.2	13
1422	Novel 3-(6-methylpyridin-2-yl)coumarin-based chalcones as selective inhibitors of cancer-related carbonic anhydrases IX and XII endowed with anti-proliferative activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1043-1052.	5.2	13

#	Article	IF	CITATIONS
1423	Immobilization of carbonic anhydrase for CO2 capture and utilization. Applied Microbiology and Biotechnology, 2022, 106, 3419-3430.	3.6	13
1424	Carbonic Anhydrase Inhibitors: Allylsulfonamide, Styrene Sulfonamide, N -allyl Sulfonamides and Some of Their Si, Ge, and B Derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2001, 16, 475-489.	0.5	12
1425	An evaluation of cytosolic erythrocyte carbonic anhydrase and catalase in carcinoma patients: An elevation of carbonic anhydrase activity. Clinical Biochemistry, 2006, 39, 804-809.	1.9	12
1426	Carbonic anhydrase inhibitors; Fluorinated phenyl sulfamates show strong inhibitory activity and selectivity for the inhibition of the tumor-associated isozymes IX and XII over the cytosolic ones I and II. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 5082-5085.	2.2	12
1427	Metal based isatin-derived sulfonamides: Their synthesis, characterization, coordination behavior and biological activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2009, 24, 859-870.	5.2	12
1428	Carbonic anhydrase inhibitors. Synthesis, molecular structures, and inhibition of the human cytosolic isozymes I and II and transmembrane isozymes IX, XII (cancer-associated) and XIV with novel 3-pyridinesulfonamide derivatives. European Journal of Medicinal Chemistry, 2011, 46, 4403-4410.	5.5	12
1429	Synthesis of rhodamine B–benzenesulfonamide conjugates and their inhibitory activity against human α- and bacterial/fungal β-carbonic anhydrases. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 5210-5213.	2.2	12
1430	Carbonic anhydrase inhibitors. Regioselective synthesis of novel series 1-substituted 1,4-dihydro-4-oxo-3-pyridinesulfonamides and their inhibition of the human cytosolic isozymes I and II and transmembrane cancer-associated isozymes IX and XII. European Journal of Medicinal Chemistry, 2012, 56, 282-291.	5.5	12
1431	Structural study of the location of the phenyl tail of benzene sulfonamides and the effect on human carbonic anhydrase inhibition. Bioorganic and Medicinal Chemistry, 2013, 21, 6674-6680.	3.0	12
1432	Salicylaldoxime derivatives as new leads for the development of carbonic anhydrase inhibitors. Bioorganic and Medicinal Chemistry, 2013, 21, 1511-1515.	3.0	12
1433	Sulfonamide inhibition studies of the β carbonic anhydrase from Drosophila melanogaster. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 2797-2801.	2.2	12
1434	Arylamino bisphosphonates: Potent and selective inhibitors of the tumor-associated carbonic anhydrase XII. Bioorganic and Medicinal Chemistry Letters, 2014, 24, 1941-1943.	2.2	12
1435	Phosphate Chemical Probes Designed for Location Specific Inhibition of Intracellular Carbonic Anhydrases. Journal of Medicinal Chemistry, 2015, 58, 7580-7590.	6.4	12
1436	Synthesis and bioactivity studies of 1-aryl-3-(2-hydroxyethylthio)-1-propanones. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 105-109.	5.2	12
1437	Synthesis, characterization and carbonic anhydrase inhibitory activity of novel benzothiazole derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1221-1225.	5.2	12
1438	Lipoyl-Homotaurine Derivative (ADM_12) Reverts Oxaliplatin-Induced Neuropathy and Reduces Cancer Cells Malignancy by Inhibiting Carbonic Anhydrase IX (CAIX). Journal of Medicinal Chemistry, 2017, 60, 9003-9011.	6.4	12
1439	Development of a Fingerprint-Based Scoring Function for the Prediction of the Binding Mode of Carbonic Anhydrase II Inhibitors. International Journal of Molecular Sciences, 2018, 19, 1851.	4.1	12
1440	Activation studies with amines and amino acids of the α-carbonic anhydrase from the pathogenic protozoan Trypanosoma cruzi. Bioorganic and Medicinal Chemistry, 2018, 26, 4187-4190.	3.0	12

#	Article	IF	CITATIONS
1441	Sulfonamides incorporating piperazine bioisosteres as potent human carbonic anhydrase I, II, IV and IX inhibitors. Bioorganic Chemistry, 2019, 91, 103130.	4.1	12
1442	An efficient method for the synthesis of novel derivatives 4-{5-[4-(4-amino-5-mercapto-4H-[1,2,4]triazol-3-yl)-phenyl]-3-trifluoromethyl-pyrazol-1-yl}-benzenesulfonamide and their anti-inflammatory potential. Bioorganic Chemistry, 2019, 91, 103110.	4.1	12
1443	Prognostic value of CAIX expression in oral squamous cell carcinoma: a systematic review and meta-analysis. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1258-1266.	5.2	12
1444	Glycomimetic Based Approach toward Selective Carbonic Anhydrase Inhibitors. ACS Medicinal Chemistry Letters, 2020, 11, 727-731.	2.8	12
1445	Exploring structure-activity relationship of S-substituted 2-mercaptoquinazolin-4(3H)-one including 4-ethylbenzenesulfonamides as human carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 598-609.	5.2	12
1446	Radiotracers for positron emission tomography (PET) targeting tumour-associated carbonic anhydrase isoforms. European Journal of Medicinal Chemistry, 2021, 213, 113046.	5.5	12
1447	Activation of carbonic anhydrases from human brain by amino alcohol oxime ethers: towards human carbonic anhydrase VII selective activators. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 48-57.	5.2	12
1448	Synthesis and biological evaluation of novel 4,7-disubstituted coumarins as selective tumor-associated carbonic anhydrase IX and XII inhibitors. Bioorganic and Medicinal Chemistry Letters, 2021, 39, 127877.	2.2	12
1449	Structural Insights into <i>Schistosoma mansoni</i> Carbonic Anhydrase (SmCA) Inhibition by Selenoureido-Substituted Benzenesulfonamides. Journal of Medicinal Chemistry, 2021, 64, 10418-10428.	6.4	12
1450	Synthesis, Crystal Structure, Inhibitory Activity and Molecular Docking of Coumarins/Sulfonamides Containing Triazolyl Pyridine Moiety as Potent Selective Carbonic Anhydrase IX and XII Inhibitors. Crystals, 2021, 11, 1076.	2.2	12
1451	Dietary inclusion of royal jelly modulates gene expression and activity of oxidative stress enzymes in zebrafish. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 885-894.	5.2	12
1452	Carbonic Anhydrase Inhibitors in Dermatology. , 2004, , 303-315.		12
1453	Natural inspired ligustrazine-based SLC-0111 analogues as novel carbonic anhydrase inhibitors. European Journal of Medicinal Chemistry, 2022, 228, 114008.	5.5	12
1454	Modulation of Carbonic Anhydrases Activity in the Hippocampus or Prefrontal Cortex Differentially Affects Social Recognition Memory in Rats. Neuroscience, 2022, 497, 184-195.	2.3	12
1455	Aromatic Sulfonamides including a Sulfonic Acid Tail: New Membrane Impermeant Carbonic Anhydrase Inhibitors for Targeting Selectively the Cancer-Associated Isoforms. International Journal of Molecular Sciences, 2022, 23, 461.	4.1	12
1456	Insights into the effect of elaborating coumarin-based aryl enaminones with sulfonamide or carboxylic acid functionality on carbonic anhydrase inhibitory potency and selectivity. Bioorganic Chemistry, 2022, 126, 105888.	4.1	12
1457	Metal Complexes of 1,3,4-Thiadiazole-2,5-Disulfonamide are Strong Dual Carbonic Anhydrase Inhibitors, although the Ligand Possesses very Weak such Properties. Metal-Based Drugs, 1995, 2, 331-336.	3.8	11
1458	Carbonic Anhydrase Inhibitors. Part 551 Metal Complexes of 1,3,4-Thiadiazole-2-Sulfonamide Derivatives: In Vitro Inhibition Studies With Carbonic Anhydrase Isozymes I, II and IV. Metal-Based Drugs, 1998, 5, 103-114.	3.8	11

#	Article	IF	CITATIONS
1459	Arylsulfonyl-N,N-dialkyl-dithiocarbamates as Tumor Cell Growth Inhibitors: Novel Agents Targeting β-Tubulin?. Journal of Enzyme Inhibition and Medicinal Chemistry, 2001, 16, 55-63.	0.5	11
1460	Carbonic Anhydrase Inhibitors: Aliphatic N-phosphorylated SulfamatesA Novel Zinc-anchoring Group Leading to Nanomolar Inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2004, 19, 275-278.	5.2	11
1461	Carbonic Anhydrase Inhibitors: Binding of Indanesulfonamides to the Human Isoformâ€II. ChemMedChem, 2008, 3, 473-477.	3.2	11
1462	Carbonic anhydrase activators. Activation of the membrane-associated isoform XV with amino acids and amines. Bioorganic and Medicinal Chemistry Letters, 2009, 19, 3430-3433.	2.2	11
1463	Synthesis and biological evaluation of a new family of anti-benzylanilinosulfonamides as CA IX inhibitors. European Journal of Medicinal Chemistry, 2009, 44, 511-518.	5.5	11
1464	Dissecting the Inhibition Mechanism of Cytosolic versus Transmembrane Carbonic Anhydrases by ESR. Journal of Physical Chemistry B, 2009, 113, 13998-14005.	2.6	11
1465	QSAR studies for the inhibition of the transmembrane carbonic anhydrase isozyme XIV with sulfonamides using PRECLAV software. Journal of Enzyme Inhibition and Medicinal Chemistry, 2009, 24, 337-349.	5.2	11
1466	Targeting Carbonic Anhydrases with Fluorescent BODIPY‣abelled Sulfonamides. European Journal of Inorganic Chemistry, 2012, 2012, 2898-2907.	2.0	11
1467	Exploration of anionic inhibition of the α-carbonic anhydrase from Thiomicrospira crunogena XCL-2 gammaproteobacterium: A potential bio-catalytic agent for industrial CO2 removal. Chemical Engineering Science, 2015, 138, 575-580.	3.8	11
1468	Carbamoylphosphonates inhibit autotaxin and metastasis formation <i>in vivo</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 767-772.	5.2	11
1469	Design and Validation of FRESH, a Drug Discovery Paradigm Resting on Robust Chemical Synthesis. ACS Medicinal Chemistry Letters, 2015, 6, 518-522.	2.8	11
1470	Development of 3-(4-aminosulphonyl)-phenyl-2-mercapto-3H-quinazolin-4-ones as inhibitors of carbonic anhydrase isoforms involved in tumorigenesis and glaucoma. Bioorganic and Medicinal Chemistry, 2016, 24, 1402-1407.	3.0	11
1471	Salts of 5-amino-2-sulfonamide-1,3,4-thiadiazole, a structural and analog of acetazolamide, show interesting carbonic anhydrase inhibitory properties, diuretic, and anticonvulsant action. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1102-1110.	5.2	11
1472	Synthesis of an acridine orange sulfonamide derivative with potent carbonic anhydrase IX inhibitory action. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 701-706.	5.2	11
1473	Cloning, expression and purification of the α-carbonic anhydrase from the mantle of the Mediterranean mussel, Mytilus galloprovincialis. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1029-1035.	5.2	11
1474	Quantitative assessment of specific carbonic anhydrase inhibitors effect on hypoxic cells using electrical impedance assays. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1079-1090.	5.2	11
1475	Sulfonamide carbonic anhydrase inhibitors: Zinc coordination and tail effects influence inhibitory efficacy and selectivity for different isoforms. Inorganica Chimica Acta, 2018, 470, 128-132.	2.4	11
1476	Synthesis and inÂvitro evaluation of piperazinyl-ureido sulfamates as steroid sulfatase inhibitors. European Journal of Medicinal Chemistry, 2019, 182, 111614.	5.5	11

#	Article	IF	CITATIONS
1477	Anion Inhibition Profile of the Î ² -Carbonic Anhydrase from the Opportunist Pathogenic Fungus Malassezia Restricta Involved in Dandruff and Seborrheic Dermatitis. Metabolites, 2019, 9, 147.	2.9	11
1478	Spirocyclic sulfonamides with carbonic anhydrase inhibitory and anti-neuropathic pain activity. Bioorganic Chemistry, 2019, 92, 103210.	4.1	11
1479	New sulfonamides containing organometallic-acylhydrazones: synthesis, characterisation and biological evaluation as inhibitors of human carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 451-458.	5.2	11
1480	Phosphonamidates are the first phosphorus-based zinc binding motif to show inhibition of β-class carbonic anhydrases from bacteria, fungi, and protozoa. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 59-64.	5.2	11
1481	Development of a cheminformatics platform for selectivity analyses of carbonic anhydrase inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 365-371.	5.2	11
1482	Effects of New NSAID-CAI Hybrid Compounds in Inflammation and Lung Fibrosis. Biomolecules, 2020, 10, 1307.	4.0	11
1483	Use of an immobilised thermostable <i>α</i> -CA (SspCA) for enhancing the metabolic efficiency of the freshwater green microalga <i>Chlorella sorokiniana</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 913-920.	5.2	11
1484	Iodoquinazolinones bearing benzenesulfonamide as human carbonic anhydrase I, II, IX and XII inhibitors: Synthesis, biological evaluation and radiosensitizing activity. European Journal of Medicinal Chemistry, 2020, 200, 112449.	5.5	11
1485	Anti-breast cancer action of carbonic anhydrase IX inhibitor 4-[4-(4-Benzo[1,3]dioxol-5-ylmethyl-piperazin-1-yl)-benzylidene-hydrazinocarbonyl]-benzenesulfonamide (BSM-0004): <i>inÂvitro</i> and <i>inÂvivo</i> studies. Journal of Enzyme Inhibition and Medicinal Chemistry. 2021. 36. 954-963.	5.2	11
1486	Phenols from <i>Origanum dictamnus</i> L. and <i>Thymus vulgaris</i> L. and their activity against <i>Malassezia globosa</i> carbonic anhydrase. Natural Product Research, 2022, 36, 1558-1564.	1.8	11
1487	Biological evaluation, radiosensitizing activity and structural insights of novel halogenated quinazoline-sulfonamide conjugates as selective human carbonic anhydrases IX/XII inhibitors. Bioorganic Chemistry, 2021, 107, 104618.	4.1	11
1488	Discovery of a novel series of indolylchalcone-benzenesulfonamide hybrids acting as selective carbonic anhydrase II inhibitors. Bioorganic Chemistry, 2021, 108, 104647.	4.1	11
1489	New Sulfanilamide Derivatives Incorporating Heterocyclic Carboxamide Moieties as Carbonic Anhydrase Inhibitors. Pharmaceuticals, 2021, 14, 828.	3.8	11
1490	Novel benzenesulfonamideâ€bearing pyrazoles and 1,2,4â€thiadiazoles as selective carbonic anhydrase inhibitors. Archiv Der Pharmazie, 2022, 355, e2100241.	4.1	11
1491	Glyco-Coated CdSe/ZnS Quantum Dots as Nanoprobes for Carbonic Anhydrase IX Imaging in Cancer Cells. ACS Applied Nano Materials, 2021, 4, 14153-14160.	5.0	11
1492	Development of a New LC-MS/MS Screening Method for Detection of 120 NPS and 43 Drugs in Blood. Separations, 2021, 8, 221.	2.4	11
1493	2-Aminobenzoxazole-appended coumarins as potent and selective inhibitors of tumour-associated carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 168-177.	5.2	11
1494	Tail-approach based design and synthesis of Arylthiazolylhydrazono-1,2,3-triazoles incorporating sulfanilamide and metanilamide as human carbonic anhydrase I, II, IV and IX inhibitors. Bioorganic Chemistry, 2022, 123, 105764.	4.1	11

#	Article	IF	CITATIONS
1495	Complexes With Biologically Active Ligands. Part 91 Metal Complexes of 5-Benzoylamino- and 5-(3-Nitrobenzoyl-Amino)-1,3,4-Thiadiazole-2-Sulfonamide as Carbonic Anhydrase Inhibitors. Metal-Based Drugs, 1997, 4, 1-7.	3.8	10
1496	Carbonic Anhydrase Inhibitors Part 721 Synthesis and Antiglaucoma Properties of Metal Complexes of p-Fluorobenzolamide. Metal-Based Drugs, 1999, 6, 67-73.	3.8	10
1497	Crystal analysis of aromatic sulfonamide binding to native and (Zn)2 adduct of human carbonic anhydrase I Michigan 1. Inorganica Chimica Acta, 2002, 339, 135-144.	2.4	10
1498	QSAR study on CA inhibitory activity of disulfonamides: effect of halogen substitution. Bioorganic and Medicinal Chemistry, 2004, 12, 2477-2482.	3.0	10
1499	Reconstitution of carbonic anhydrase activity of the cell-surface-binding protein of vaccinia virus. Biochemical Journal, 2007, 407, 61-67.	3.7	10
1500	Carbonic anhydrase inhibitors. Interaction of the antitumor sulfamate EMD 486019 with twelve mammalian carbonic anhydrase isoforms: Kinetic and X-ray crystallographic studies. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 4282-4286.	2.2	10
1501	Carbonic Anhydrase Inhibition: Insight into Non-COX-2 Pharmacological Effect of some Coxibs. Current Pharmaceutical Design, 2008, 14, 679-684.	1.9	10
1502	Structural modulation of the biological activity of gold nanoparticles functionalized with a carbonic anhydrase inhibitor. European Physical Journal E, 2013, 36, 48.	1.6	10
1503	Synthesis of new biologically active isothiazolo[4,5-b]carbazole-type tetracyclic derivatives via an indole-2,3-quinodimethane approach. Tetrahedron, 2014, 70, 8286-8302.	1.9	10
1504	Hydroxylamine-O-sulfonamide is a versatile lead compound for the development of carbonic anhydrase inhibitors. Chemical Communications, 2015, 51, 11519-11522.	4.1	10
1505	Vasorelaxation induced by dodoneine is mediated by calcium channels blockade and carbonic anhydrase inhibition on vascular smooth muscle cells. Journal of Ethnopharmacology, 2015, 169, 8-17.	4.1	10
1506	Cyclodextrin complexation highly enhances efficacy of arylsulfonylureido benzenesulfonamide carbonic anhydrase inhibitors as a topical antiglaucoma agents. Bioorganic and Medicinal Chemistry, 2015, 23, 6223-6227.	3.0	10
1507	Investigation of the inhibitory properties of some phenolic standards and bee products against human carbonic anhydrase I and II. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 119-124.	5.2	10
1508	Microwave assisted synthesis of novel acridine–acetazolamide conjugates and investigation of their inhibition effects on human carbonic anhydrase isoforms hCA I, II, IV and VII. Bioorganic and Medicinal Chemistry, 2016, 24, 3548-3555.	3.0	10
1509	Lucky Switcheroo: Dramatic Potency and Selectivity Improvement of Imidazoline Inhibitors of Human Carbonic Anhydrase VII. ACS Medicinal Chemistry Letters, 2017, 8, 1105-1109.	2.8	10
1510	Carbonic anhydrase I, II, IV and IX inhibition with a series of 7-amino-3,4-dihydroquinolin-2(1H)-one derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 885-892.	5.2	10
1511	Sulfonamide inhibition studies of two β-carbonic anhydrases from the ascomycete fungus <i>Sordaria macrospora,</i> CAS1 and CAS2. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 390-396.	5.2	10
1512	Fluoroenesulphonamides: <i>N</i> -sulphonylurea isosteres showing nanomolar selective cancer-related transmembrane human carbonic anhydrase inhibition. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 804-808.	5.2	10

#	Article	IF	CITATIONS
1513	Improving the carbonic anhydrase inhibition profile of the sulfamoylphenyl pharmacophore by attachment of carbohydrate moieties. Bioorganic Chemistry, 2018, 76, 61-66.	4.1	10
1514	Comparison of the Anion Inhibition Profiles of the α-CA Isoforms (SpiCA1, SpiCA2 and SpiCA3) from the Scleractinian Coral Stylophora pistillata. International Journal of Molecular Sciences, 2018, 19, 2128.	4.1	10
1515	Sweet Binders: Carbonic Anhydrase IX in Complex with Sucralose. ACS Medicinal Chemistry Letters, 2018, 9, 657-661.	2.8	10
1516	From random to rational: A discovery approach to selective subnanomolar inhibitors of human carbonic anhydrase IV based on the Castagnoli-Cushman multicomponent reaction. European Journal of Medicinal Chemistry, 2019, 182, 111642.	5.5	10
1517	Highly hydrophilic 1,3-oxazol-5-yl benzenesulfonamide inhibitors of carbonic anhydrase II for reduction of glaucoma-related intraocular pressure. Bioorganic and Medicinal Chemistry, 2019, 27, 115086.	3.0	10
1518	Thermostability enhancement of the α-carbonic anhydrase from <i>Sulfurihydrogenibium yellowstonense</i> by using the anchoring-and-self-labelling- <i>protein-tag</i> system (ASL <i>^{tag}</i>). Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 946-954.	5.2	10
1519	Inhibition of the newly discovered β‑carbonic anhydrase from the protozoan pathogen Trichomonas vaginalis with inorganic anions and small molecules. Journal of Inorganic Biochemistry, 2020, 213, 111274.	3.5	10
1520	Activation studies of the β-carbonic anhydrases from <i>Escherichia coli</i> with amino acids and amines. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1379-1386.	5.2	10
1521	Toxicity evaluation of sulfamides and coumarins that efficiently inhibit human carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1765-1772.	5.2	10
1522	Crystal Structure of a Tetrameric Type II β-Carbonic Anhydrase from the Pathogenic Bacterium Burkholderia pseudomallei. Molecules, 2020, 25, 2269.	3.8	10
1523	Structural and biochemical characterization of novel carbonic anhydrases from <i>Phaeodactylum tricornutum</i> . Acta Crystallographica Section D: Structural Biology, 2020, 76, 676-686.	2.3	10
1524	Zeta-carbonic anhydrases show CS2 hydrolase activity: A new metabolic carbon acquisition pathway in diatoms?. Computational and Structural Biotechnology Journal, 2021, 19, 3427-3436.	4.1	10
1525	Handling drug-target selectivity: A study on ureido containing Carbonic Anhydrase inhibitors. European Journal of Medicinal Chemistry, 2021, 212, 113035.	5.5	10
1526	Role of Carbonic Anhydrase in Cerebral Ischemia and Carbonic Anhydrase Inhibitors as Putative Protective Agents. International Journal of Molecular Sciences, 2021, 22, 5029.	4.1	10
1527	Protective effects of carbonic anhydrase inhibition in brain ischaemia <i>in vitro</i> and <i>in vivo</i> models. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 964-976.	5.2	10
1528	Intracellular pH-mediated induction of apoptosis in HeLa cells by a sulfonamide carbonic anhydrase inhibitor. International Journal of Biological Macromolecules, 2022, 201, 37-46.	7.5	10
1529	Perfusion-Based Bioreactor Culture and Isothermal Microcalorimetry for Preclinical Drug Testing with the Carbonic Anhydrase Inhibitor SLC-0111 in Patient-Derived Neuroblastoma. International Journal of Molecular Sciences, 2022, 23, 3128.	4.1	10
1530	Cloning, purification, kinetic and anion inhibition studies of a recombinant β-carbonic anhydrase from the Atlantic salmon parasite platyhelminth <i>Gyrodactylus salaris</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1577-1586.	5.2	10

#	Article	IF	CITATIONS
1531	Investigation of carbonic anhydrase inhibitory effects and cytotoxicities of pyrazole-based hybrids carrying hydrazone and zinc-binding benzenesulfonamide pharmacophores. Bioorganic Chemistry, 2022, 127, 105969.	4.1	10
1532	Carbonic Anhydrase Inhibitors; Phosphoryl-Sulfonamides-A New Class of High Affinity Inhibitors of Isozymes I and II. Journal of Enzyme Inhibition and Medicinal Chemistry, 2000, 15, 297-309.	0.5	9
1533	Crystallographic Studies on Carbonic Anhydrases from Fungal Pathogens for Structure-Assisted Drug Development. , 0, , 323-333.		9
1534	Editorial [Hot Topic: Carbonic Anhydrases: Again, and Again, and Again (Executive Editor: Claudiu T.) Tj ETQq0 0 (D rgBT /Ov ₽.9	erlock 10 Tf
1535	Mutation of Phe91 to Asn in human carbonic anhydrase I unexpectedly enhanced both catalytic activity and affinity for sulfonamide inhibitors. Bioorganic and Medicinal Chemistry, 2010, 18, 5498-5503.	3.0	9
1536	Purification and inhibition studies with anions and sulfonamides of an α-carbonic anhydrase from the Antarctic seal Leptonychotes weddellii. Bioorganic and Medicinal Chemistry, 2011, 19, 1847-1851.	3.0	9
1537	QSAR studies of sulfamate and sulfamide inhibitors targeting human carbonic anhydrase isozymes I, II, IX and XII. Bioorganic and Medicinal Chemistry, 2013, 21, 1404-1409.	3.0	9
1538	Targeting Carbonic Anhydrases. , 2014, , .		9
1539	Human Carbonic Anhydrases: Catalytic Properties, Structural Features, and Tissue Distribution. , 2015, , 17-30.		9
1540	Carbonic Anhydrase Glycoinhibitors belonging to the Aminoxysulfonamide Series. ACS Medicinal Chemistry Letters, 2015, 6, 819-821.	2.8	9
1541	Synthesis of two phloroglucinol derivatives with cinnamyl moieties as inhibitors of the carbonic anhydrase isozymes I and II: an <i>in vitro</i> study. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 208-212.	5.2	9
1542	Design and Comparative Evaluation of the Anticonvulsant Profile, Carbonic-Anhydrate Inhibition and Teratogenicity of Novel Carbamate Derivatives of Branched Aliphatic Carboxylic Acids with 4-Aminobenzensulfonamide. Neurochemical Research, 2017, 42, 1972-1982.	3.3	9
1543	Development of sulfonamides incorporating phenylacrylamido functionalities as carbonic anhydrase isoforms I, II, IX and XII inhibitors. Bioorganic and Medicinal Chemistry, 2017, 25, 5726-5732.	3.0	9
1544	Bortezomib inhibits mammalian carbonic anhydrases. Bioorganic and Medicinal Chemistry, 2017, 25, 5064-5067.	3.0	9
1545	Synthesis of N′-phenyl-N-hydroxyureas and investigation of their inhibitory activities on human carbonic anhydrases. Bioorganic Chemistry, 2018, 78, 1-6.	4.1	9
1546	Inhibition studies of <i>Brucella suis</i> β-carbonic anhydrases with a series of 4-substituted pyridine-3-sulphonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 255-259.	5.2	9
1547	Sulfonamide Inhibition Studies of a New β-Carbonic Anhydrase from the Pathogenic Protozoan Entamoeba histolytica. International Journal of Molecular Sciences, 2018, 19, 3946.	4.1	9
1548	Cloning, Characterization and Anion Inhibition Studies of a β-Carbonic Anhydrase from the Pathogenic Protozoan Entamoeba histolytica. Molecules, 2018, 23, 3112.	3.8	9

#	Article	IF	CITATIONS
1549	Seeking new approach for therapeutic treatment of cholera disease via inhibition of bacterial carbonic anhydrases: experimental and theoretical studies for sixteen benzenesulfonamide derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1186-1192.	5.2	9
1550	Exploring new structural features of the 4-[(3-methyl-4-aryl-2,3-dihydro-1,3-thiazol-2-ylidene)amino]benzenesulphonamide scaffold for the inhibition of human carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1526-1533.	5.2	9
1551	β3-Adrenoreceptor Activity Limits Apigenin Efficacy in Ewing Sarcoma Cells: A Dual Approach to Prevent Cell Survival. International Journal of Molecular Sciences, 2019, 20, 2149.	4.1	9
1552	Activation Studies of the Î ³ -Carbonic Anhydrases from the Antarctic Marine Bacteria Pseudoalteromonas haloplanktis and Colwellia psychrerythraea with Amino Acids and Amines. Marine Drugs, 2019, 17, 238.	4.6	9
1553	Activation Studies of the β-Carbonic Anhydrase from the Pathogenic Protozoan Entamoeba histolytica with Amino Acids and Amines. Metabolites, 2019, 9, 26.	2.9	9
1554	Carbonic Anhydrase Inhibitors of Different Structures Dilate Pre-Contracted Porcine Retinal Arteries. International Journal of Molecular Sciences, 2019, 20, 467.	4.1	9
1555	Investigation of pesticides on honey bee carbonic anhydrase inhibition. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1923-1927.	5.2	9
1556	Design, Synthesis, and Biological Evaluation of 1,2,3-Triazole-linked triazino[5,6-b]indole-benzene sulfonamide Conjugates as Potent Carbonic Anhydrase I, II, IX, and XIII Inhibitors. Metabolites, 2020, 10, 200.	2.9	9
1557	Effect of Carbonic Anhydrase IX inhibitors on human endothelial cell survival. Pharmacological Research, 2020, 159, 104964.	7.1	9
1558	Discovery of first-in-class multi-target adenosine A2A receptor antagonists-carbonic anhydrase IX and XII inhibitors. 8-Amino-6-aryl-2-phenyl-1,2,4-triazolo [4,3-a]pyrazin-3-one derivatives as new potential antitumor agents. European Journal of Medicinal Chemistry, 2020, 201, 112478.	5.5	9
1559	Bioorganometallic derivatives of 4-hydrazino-benzenesulphonamide as carbonic anhydrase inhibitors: synthesis, characterisation and biological evaluation. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 622-628.	5.2	9
1560	An anion and small molecule inhibition study of the β-carbonic anhydrase from <i>Staphylococcus aureus</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1088-1092.	5.2	9
1561	Inhibition studies on carbonic anhydrase isoforms I, II, IV and IX with N-arylsubstituted secondary sulfonamides featuring a bicyclic tetrahydroindazole scaffold. European Journal of Medicinal Chemistry, 2021, 220, 113490.	5.5	9
1562	Sultam based Carbonic Anhydrase VII inhibitors for the management of neuropathic pain. European Journal of Medicinal Chemistry, 2022, 227, 113956.	5.5	9
1563	Carbonic Anhydrase Inhibition with Sulfonamides Incorporating Pyrazole- and Pyridazinecarboxamide Moieties Provides Examples of Isoform-Selective Inhibitors. Molecules, 2021, 26, 7023.	3.8	9
1564	Amine- and Amino Acid-Based Compounds as Carbonic Anhydrase Activators. Molecules, 2021, 26, 7331.	3.8	9
1565	Identification of Novel and Potent Indole-Based Benzenesulfonamides as Selective Human Carbonic Anhydrase II Inhibitors: Design, Synthesis, In Vitro, and In Silico Studies. International Journal of Molecular Sciences, 2022, 23, 2540.	4.1	9
1566	Pyrazolo[4,3-c]pyridine Sulfonamides as Carbonic Anhydrase Inhibitors: Synthesis, Biological and In Silico Studies. Pharmaceuticals, 2022, 15, 316.	3.8	9

#	Article	IF	CITATIONS
1567	4-Anilinoquinazoline-based benzenesulfonamides as nanomolar inhibitors of carbonic anhydrase isoforms I, II, IX, and XII: design, synthesis, <i>in-vitro</i> , and <i>in-silico</i> biological studies. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 994-1004.	5.2	9
1568	Squaramide-Tethered Sulfonamides and Coumarins: Synthesis, Inhibition of Tumor-Associated CAs IX and XII and Docking Simulations. International Journal of Molecular Sciences, 2022, 23, 7685.	4.1	9
1569	Carbonic Anhydrase Inhibitors: Synthesis and Inhibition Against Isozymes I, II and IV of Topically Acting Antiglaucoma Sulfonamides Incorporating <i>cis</i> -5-Norbornene- <i>endo</i> -3-Carboxy-2-Carboxamido Moieties. Journal of Enzyme Inhibition and Medicinal Chemistry. 2001. 16. 113-123.	0.5	8
1570	Redox State and Carbonic Anhydrase Isozyme IX Expression in Human Renal Cell Carcinoma: Biochemical and Morphological Investigations. Journal of Enzyme Inhibition and Medicinal Chemistry, 2004, 19, 287-291.	5.2	8
1571	Carbonic anhydrase inhibitors. Inhibition of red blood cell ostrich (Struthio camelus) carbonic anhydrase with a series of aromatic and heterocyclic sulfonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2005, 20, 383-387.	5.2	8
1572	Small-Molecule Suppression of Misfolding of Mutated Human Carbonic Anhydrase II Linked to Marble Brain Disease. Biochemistry, 2009, 48, 5358-5364.	2.5	8
1573	Phenylethynylbenzenesulfonamide regioisomers strongly and selectively inhibit the transmembrane, tumor-associated carbonic anhydrase isoforms IX and XII over the cytosolic isoforms I and II. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 5892-5896.	2.2	8
1574	Cloning, characterization and sulfonamide inhibition studies of an α-carbonic anhydrase from the living fossil sponge Astrosclera willeyana. Bioorganic and Medicinal Chemistry, 2012, 20, 1403-1410.	3.0	8
1575	Chemometric modeling of breast cancer associated carbonic anhydrase IX inhibitors belonging to the ureido-substituted benzene sulfonamide class. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 877-883.	5.2	8
1576	Carbonic Anhydrase Protects Fatty Liver Grafts against Ischemic Reperfusion Damage. PLoS ONE, 2015, 10, e0134499.	2.5	8
1577	In silicomodeling ofβ-carbonic anhydrase inhibitors from the fungusMalassezia globosaas antidandruff agents. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 31, 1-8.	5.2	8
1578	Exploring QSARs of some benzenesulfonamides incorporating cyanoacrylamide moieties as a carbonic anhydrase inhibitors (specifically against tumor-associated isoforms IX and XII). Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 519-523.	5.2	8
1579	Synthesis and carbonic anhydrase inhibitory effects of new N-glycosylsulfonamides incorporating the phenol moiety. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 3892-3895.	2.2	8
1580	Sulfonamide inhibition studies of the β-carbonic anhydrase from the newly discovered bacterium Enterobacter sp. B13. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 1821-1826.	2.2	8
1581	Cloning, expression and biochemical characterization of a β -carbonic anhydrase from the soil bacterium <i>Enterobacter</i> sp. B13. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1111-1118.	5.2	8
1582	Comparison of the anion inhibition profiles of the β- and γ-carbonic anhydrases from the pathogenic bacterium Burkholderia pseudomallei. Bioorganic and Medicinal Chemistry, 2017, 25, 2010-2015.	3.0	8
1583	Anion inhibition studies of a beta carbonic anhydrase from the malaria mosquito <i>Anopheles gambiae</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 359-363.	5.2	8
1584	Benzenesulfonamides incorporating nitrogenous bases show effective inhibition of β-carbonic anhydrases from the pathogenic fungi Cryptococcus neoformans, Candida glabrata and Malassezia globosa. Bioorganic Chemistry, 2019, 86, 39-43.	4.1	8

#	Article	IF	CITATIONS
1585	(Hetero)aryl substituted thiazol-2,4-yl scaffold as human carbonic anhydrase I, II, VII and XIV activators. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 224-229.	5.2	8
1586	3-Aminobenzenesulfonamides incorporating acylthiourea moieties selectively inhibit the tumor-associated carbonic anhydrase isoform IX over the off-target isoforms I, II and IV. Bioorganic Chemistry, 2019, 82, 123-128.	4.1	8
1587	Inhibition survey with phenolic compounds against the δ- and Îclass carbonic anhydrases from the marine diatom <i>thalassiosira weissflogii</i> and protozoan <i>Plasmodium falciparum</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 377-382.	5.2	8
1588	Breakthroughs in Medicinal Chemistry: New Targets and Mechanisms, New Drugs, New Hopes–6. Molecules, 2020, 25, 119.	3.8	8
1589	In Silico-Guided Identification of New Potent Inhibitors of Carbonic Anhydrases Expressed in <i>Vibrio cholerae</i> . ACS Medicinal Chemistry Letters, 2020, 11, 2294-2299.	2.8	8
1590	N-aryl-N′-ureido-O-sulfamates as potent and selective inhibitors of hCA VB over hCA VA: Deciphering the binding mode of new potential agents in mitochondrial dysfunctions. Bioorganic Chemistry, 2020, 100, 103896.	4.1	8
1591	Hypoxia-Activated Prodrug Derivatives of Carbonic Anhydrase Inhibitors in Benzenesulfonamide Series: Synthesis and Biological Evaluation. Molecules, 2020, 25, 2347.	3.8	8
1592	Synthetic Strategies and Computational Inhibition Activity Study for Triazinyl-Substituted Benzenesulfonamide Conjugates with Polar and Hydrophobic Amino Acids as Inhibitors of Carbonic Anhydrases. International Journal of Molecular Sciences, 2020, 21, 3661.	4.1	8
1593	PEG Linker Length Strongly Affects Tumor Cell Killing by PEGylated Carbonic Anhydrase Inhibitors in Hypoxic Carcinomas Expressing Carbonic Anhydrase IX. International Journal of Molecular Sciences, 2021, 22, 1120.	4.1	8
1594	Synthesis and Biological Evaluation of Coumarin-Linked 4-Anilinomethyl-1,2,3-Triazoles as Potent Inhibitors of Carbonic Anhydrases IX and XIII Involved in Tumorigenesis. Metabolites, 2021, 11, 225.	2.9	8
1595	THE ROLES OF CARBONIC ANHYDRASE ISOZYMES IN CANCER. , 2001, , 157-169.		8
1596	Identification and characterization of a novel zebrafish (<i>Danio rerio</i>) pentraxin–carbonic anhydrase. PeerJ, 2017, 5, e4128.	2.0	8
1597	Coumarins inhibit Îclass carbonic anhydrase from <i>Plasmodium falciparum</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 680-685.	5.2	8
1598	Inhibition of <i>Schistosoma mansoni</i> carbonic anhydrase by the antiparasitic drug clorsulon: X-ray crystallographic and <i>in vitro</i> studies. Acta Crystallographica Section D: Structural Biology, 2022, 78, 321-327.	2.3	8
1599	Development of Sulfamoylated 4-(1-Phenyl-1 <i>H</i> -1,2,3-triazol-4-yl)phenol Derivatives as Potent Steroid Sulfatase Inhibitors for Efficient Treatment of Breast Cancer. Journal of Medicinal Chemistry, 2022, 65, 5044-5056.	6.4	8
1600	Selenocarbamates As a Prodrugâ€Based Approach to Carbonic Anhydrase Inhibition. ChemMedChem, 2022, 17, .	3.2	8
1601	One-Pot Procedure for the Synthesis of Asymmetric Substituted Ureido Benzene Sulfonamides as Effective Inhibitors of Carbonic Anhydrase Enzymes. Journal of Medicinal Chemistry, 2022, 65, 824-837.	6.4	8
1602	Heterologous expression and biochemical characterisation of the recombinant β-carbonic anhydrase (MpaCA) from the warm-blooded vertebrate pathogen <i>malassezia pachydermatis</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 62-68.	5.2	8

#	Article	IF	CITATIONS
1603	Selective inhibition of carbonic anhydrase IX by sulphonylated 1,2,3-triazole incorporated benzenesulphonamides capable of inducing apoptosis. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1454-1463.	5.2	8
1604	Inhibitors of Mitochondrial Human Carbonic Anhydrases VA and VB as a Therapeutic Strategy against Paclitaxel-Induced Neuropathic Pain in Mice. International Journal of Molecular Sciences, 2022, 23, 6229.	4.1	8
1605	A comparative study of carbonic anhydrase activity in lymphocytes from colorectal cancer tissues and adjacent healthy counterparts. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1651-1655.	5.2	8
1606	Carbonic anhydrase inhibitors. Inhibition of human tumor-associated isozymes IX and cytosolic isozymes I and II with some 1,3,4-oxadiazole-thiols. Journal of Enzyme Inhibition and Medicinal Chemistry, 2006, 21, 351-359.	5.2	7
1607	Carbonic anhydrase inhibitors: The very weak inhibitors dithiothreitol, β-mercaptoethanol, tris(carboxyethyl)phosphine and threitol interfere with the binding of sulfonamides to isozymes II and IX. Bioorganic and Medicinal Chemistry Letters, 2008, 18, 1898-1903.	2.2	7
1608	Carbonic Anhydrase Inhibitors: Glycosylsulfanilamides Act as Subnanomolar Inhibitors of the Human Secreted Isoform VI. Chemical Biology and Drug Design, 2009, 74, 636-639.	3.2	7
1609	Virtual screening-driven identification of human carbonic anhydrase inhibitors incorporating an original, new pharmacophore. Bioorganic and Medicinal Chemistry Letters, 2011, 21, 2515-2520.	2.2	7
1610	Carbonic anhydrase binding site parameterization in OPLS-AA force field. Bioorganic and Medicinal Chemistry, 2013, 21, 1427-1430.	3.0	7
1611	Chemometric QSAR modeling and in silico design of carbonic anhydrase inhibition of a coral secretory isoform by sulfonamide. Bioorganic and Medicinal Chemistry, 2013, 21, 1495-1502.	3.0	7
1612	Expression and characterization of a recombinant psychrophilic Î ³ -carbonic anhydrase (NcoCA) identified in the genome of the Antarctic cyanobacteria belonging to the genus Nostoc. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 810-817.	5.2	7
1613	Investigation of piperazines as human carbonic anhydrase I, II, IV and VII activators. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 303-308.	5.2	7
1614	The first activation study of the Î ² -carbonic anhydrases from the pathogenic bacteriaBrucella suisandFrancisella tularensiswith amines and amino acids. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1178-1185.	5.2	7
1615	Exploration of the residues modulating the catalytic features of human carbonic anhydrase XIII by a site-specific mutagenesis approach. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1506-1510.	5.2	7
1616	Stereoselective pharmacokinetic and pharmacodynamic analysis of a CNS-active sulphamoylphenyl carbamate derivative. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1078-1082.	5.2	7
1617	Comparison of blood carbonic anhydrase activity of athletes performing interval and continuous running exercise at high altitude. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 218-223.	5.2	7
1618	Unconventional amino acids in medicinal chemistry: First report on taurine merged within carbonic anhydrase inhibitors. Bioorganic Chemistry, 2020, 103, 104236.	4.1	7
1619	Nontargeted Identification of Plasma Proteins O-, N-, and S-Transmethylated by O-Methyl Organophosphates. Analytical Chemistry, 2020, 92, 15420-15428.	6.5	7
1620	Benzylaminoethylureidoâ€Tailed Benzenesulfonamides Show Potent Inhibitory Activity against Bacterial Carbonic Anhydrases. ChemMedChem, 2020, 15, 2444-2447.	3.2	7

#	Article	IF	CITATIONS
1621	A class of carbonic anhydrase IX/XII – selective carboxylate inhibitors. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 549-554.	5.2	7
1622	Effect of amino acids and amines on the activity of the recombinant Î ¹ -carbonic anhydrase from the Gram-negative bacterium <i>Burkholderia territorii</i> . Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1000-1006.	5.2	7
1623	Design and synthesis of benzenesulfonamideâ€linked imidazo[2,1â€ <i>b</i>][1,3,4]thiadiazole derivatives as carbonic anhydrase I and II inhibitors. Archiv Der Pharmazie, 2021, 354, e2100028.	4.1	7
1624	Coronaviruses. Expert Opinion on Therapeutic Patents, 2021, 31, 291-294.	5.0	7
1625	3-Functionalised benzenesulphonamide based 1,3,4-oxadiazoles as selective carbonic anhydrase XIII inhibitors: Design, synthesis and biological evaluation. Bioorganic and Medicinal Chemistry Letters, 2021, 37, 127856.	2.2	7
1626	Synthesis of new 7â€aminoâ€3,4â€dihydroquinolinâ€2(1 <i>H</i>)â€oneâ€peptide derivatives and their carbonic anhydrase enzyme inhibition, antioxidant, and cytotoxic activities. Archiv Der Pharmazie, 2021, 354, e2100122.	4.1	7
1627	Tellurides bearing benzensulfonamide as carbonic anhydrase inhibitors with potent antitumor activity. Bioorganic and Medicinal Chemistry Letters, 2021, 45, 128147.	2.2	7
1628	Exploring benzoxaborole derivatives as carbonic anhydrase inhibitors: a structural and computational analysis reveals their conformational variability as a tool to increase enzyme selectivity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2019, 34, 1498-1505.	5.2	7
1629	Pharmacological inhibition of Carbonic Anhydrase IX and XII to enhance targeting of acute myeloid leukaemia cells under hypoxic conditions. Journal of Cellular and Molecular Medicine, 2021, 25, 11039-11052.	3.6	7
1630	Post-translational modifications in tumor-associated carbonic anhydrases. Amino Acids, 2022, 54, 543-558.	2.7	7
1631	Exploration of 2-phenylquinoline-4-carboxamide linked benzene sulfonamide derivatives as isoform selective inhibitors of transmembrane human carbonic anhydrases. European Journal of Medicinal Chemistry, 2022, 234, 114247.	5.5	7
1632	Synthesis of a new series of quinoline/pyridine indole-3-sulfonamide hybrids as selective carbonic anhydrase IX inhibitors. Bioorganic and Medicinal Chemistry Letters, 2022, 70, 128809.	2.2	7
1633	Click chemistryâ€based synthesis of new benzenesulfonamide derivatives bearing triazole ring as selective carbonic anhydrase II inhibitors. Drug Development Research, 2022, 83, 1281-1291.	2.9	7
1634	Mutation of active site residues Asn67 to Ile, Cln92 to Val and Leu204 to Ser in human carbonic anhydrase II: Influences on the catalytic activity and affinity for inhibitors. Bioorganic and Medicinal Chemistry, 2012, 20, 2208-2213.	3.0	6
1635	Anion inhibition studies of an α-carbonic anhydrase from the living fossil Astrosclera willeyana. Bioorganic and Medicinal Chemistry Letters, 2012, 22, 1314-1316.	2.2	6
1636	Novel antibody to a carbonic anhydrase: patent evaluation of WO2011138279A1. Expert Opinion on Therapeutic Patents, 2013, 23, 757-760.	5.0	6
1637	N-glycosyl-N-hydroxysulfamides as potent inhibitors of Brucella suis carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 1010-1012.	5.2	6
1638	Synthesis of Enantiomeric Aminoalkylcarbamoylphosphonates and Their Evaluation as Dualâ€Action Anticancer MMP and Carbonic Anhydrase Inhibitors. Heteroatom Chemistry, 2015, 26, 257-269.	0.7	6

#	Article	lF	CITATIONS
1639	Synthesis of pro-apoptotic indapamide derivatives as anticancer agents. Journal of Enzyme Inhibition and Medicinal Chemistry, 2015, 30, 967-980.	5.2	6
1640	Polyamines and α-Carbonic Anhydrases. Molecules, 2016, 21, 1726.	3.8	6
1641	CO2 Permeability of Rat Hepatocytes and Relation of CO2 Permeability to CO2 Production. Cellular Physiology and Biochemistry, 2018, 46, 1198-1208.	1.6	6
1642	Synthesis, X-ray structure, in silico calculation, and carbonic anhydrase inhibitory properties of benzylimidazole metal complexes. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 1150-1159.	5.2	6
1643	Extending the Inhibition Profiles of Coumarin-Based Compounds Against Human Carbonic Anhydrases: Synthesis, Biological, and In Silico Evaluation. Molecules, 2019, 24, 3580.	3.8	6
1644	Carbonic Anhydrase Inhibitor—NO Donor Hybrids and Their Pharmacological Applications. , 2019, , 229-242.		6
1645	Synthesis and human carbonic anhydrase I, II, VA, and XII inhibition with novel amino acid–sulphonamide conjugates. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 489-497.	5.2	6
1646	Synthesis and carbonic anhydrase activating properties of a series of 2-amino-imidazolines structurally related to clonidine ¹ . Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1003-1010.	5.2	6
1647	2-Mercaptobenzoxazoles: a class of carbonic anhydrase inhibitors with a novel binding mode to the enzyme active site. Chemical Communications, 2020, 56, 8297-8300.	4.1	6
1648	Anion Inhibition Studies of the β-Class Carbonic Anhydrase CAS3 from the Filamentous Ascomycete Sordaria macrospora. Metabolites, 2020, 10, 93.	2.9	6
1649	Looking toward the Rim of the Active Site Cavity of Druggable Human Carbonic Anhydrase Isoforms. ACS Medicinal Chemistry Letters, 2020, 11, 1000-1005.	2.8	6
1650	Synthesis, computational studies and assessment of <i>inÂvitro</i> inhibitory activity of umbelliferon-based compounds against tumour-associated carbonic anhydrase isoforms IX and XII. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1442-1449.	5.2	6
1651	X-ray crystallography of Epacadostat in adduct with Carbonic Anhydrase IX. Bioorganic Chemistry, 2020, 97, 103669.	4.1	6
1652	New Dihydrothiazole Benzensulfonamides: Looking for Selectivity toward Carbonic Anhydrase Isoforms I, II, IX, and XII. ACS Medicinal Chemistry Letters, 2020, 11, 852-856.	2.8	6
1653	Preparation, carbonic anhydrase enzyme inhibition and antioxidant activity of novel 7-amino-3,4-dihydroquinolin-2(1H)-one derivatives incorporating mono or dipeptide moiety. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 1021-1026.	5.2	6
1654	Multitargeting application of proline-derived peptidomimetics addressing cancer-related human matrix metalloproteinase 9 and carbonic anhydrase II. European Journal of Medicinal Chemistry, 2021, 214, 113260.	5.5	6
1655	Design, synthesis and photoluminescent studies of new 1,5-benzodiazepines derivatives: Towards new ESIPT compounds. Tetrahedron, 2021, 86, 132078.	1.9	6
1656	The Glitazone Class of Drugs as Carbonic Anhydrase Inhibitors—A Spin-Off Discovery from Fragment Screening. Molecules, 2021, 26, 3010.	3.8	6

#	Article	IF	CITATIONS
1657	Chromene-Containing Aromatic Sulfonamides with Carbonic Anhydrase Inhibitory Properties. International Journal of Molecular Sciences, 2021, 22, 5082.	4.1	6
1658	Quinoline-sulfamoyl carbamates/sulfamide derivatives: Synthesis, cytotoxicity, carbonic anhydrase activity, and molecular modelling studies. Bioorganic Chemistry, 2021, 110, 104778.	4.1	6
1659	Insertion of metal carbenes into the anilinic N–H bond of unprotected aminobenzenesulfonamides delivers low nanomolar inhibitors of human carbonic anhydrase IX and XII isoforms. European Journal of Medicinal Chemistry, 2021, 218, 113352.	5.5	6
1660	Drug Screening in Human Cells by NMR Spectroscopy Allows the Early Assessment of Drug Potency. Angewandte Chemie, 2020, 132, 6597-6601.	2.0	6
1661	Hydroxamates as Carbonic Anhydrase Inhibitors. , 2013, , 55-69.		6
1662	Design and development of novel series of indoleâ€3â€sulfonamide ureido derivatives as selective carbonic anhydrase II inhibitors. Archiv Der Pharmazie, 2022, 355, e2100333.	4.1	6
1663	Interaction Studies between Carbonic Anhydrase and a Sulfonamide Inhibitor by Experimental and Theoretical Approaches. ACS Medicinal Chemistry Letters, 2022, 13, 271-277.	2.8	6
1664	New Pyridinium Salt Derivatives of 2-(Hydrazinocarbonyl)-3-phenyl-1H-indole-5- sulfonamide as Selective Inhibitors of Tumour-Related Human Carbonic Anhydrase Isoforms IX and XII. Anti-Cancer Agents in Medicinal Chemistry, 2022, 22, 2637-2646.	1.7	6
1665	Ureidosulfocoumarin Derivatives As Selective and Potent Carbonic Anhydrase IX and XII Inhibitors. ChemMedChem, 2022, 17, e202100725.	3.2	6
1666	Sulfonamide diuretic azosemide as an efficient carbonic anhydrase inhibitor. Journal of Molecular Structure, 2022, 1268, 133672.	3.6	6
1667	New Macrocyclic Amines Showing Activity as HIV Entry Inhibitors Against Wild Type and Multi-Drug Resistant Viruses. Molecules, 2009, 14, 1927-1937.	3.8	5
1668	Carbonic anhydrase inhibitors: Gd(iii) complexes of DOTA- and TETA-sulfonamide conjugates targeting the tumor associated carbonic anhydrase isozymes IX and XII. New Journal of Chemistry, 2010, 34, 2139.	2.8	5
1669	CA IX stratification based on cancer treatment: a patent evaluation of US2016/0002350. Expert Opinion on Therapeutic Patents, 2016, 26, 1105-1109.	5.0	5
1670	Synthesis, structure and properties of N -aminosaccharin – A selective inhibitor of human carbonic anhydrase I. Tetrahedron Letters, 2017, 58, 172-174.	1.4	5
1671	Polyhedral Oligomeric Silsesquioxane (POSS) Bearing Glyoxylic Aldehyde as Clickable Platform Towards Multivalent Conjugates. Chemistry - A European Journal, 2017, 23, 17867-17869.	3.3	5
1672	lodine-mediated one-pot intramolecular decarboxylation domino reaction for accessing functionalised 2-(1,3,4-oxadiazol-2-yl)anilines with carbonic anhydrase inhibitory action. Journal of Enzyme Inhibition and Medicinal Chemistry, 2018, 33, 615-628.	5.2	5
1673	Co-targeting intracellular pH and essential amino acid uptake cooperates to induce cell death of T-ALL/LL cells. Leukemia and Lymphoma, 2018, 59, 460-468.	1.3	5
1674	Activation Profile Analysis of CruCA4, an α-Carbonic Anhydrase Involved in Skeleton Formation of the Mediterranean Red Coral, Corallium rubrum. Molecules, 2018, 23, 66.	3.8	5

#	Article	IF	CITATIONS
1675	Carbonic anhydrase inhibitors for the treatment of epilepsy and obesity. , 2019, , 311-329.		5
1676	Comparison of the Sulfonamide Inhibition Profiles of the α-Carbonic Anhydrase Isoforms (SpiCA1,) Tj ETQq0 0 0 Drugs, 2019, 17, 146.) rgBT /Ov 4.6	erlock 10 Tf 50 5
1677	Screening of benzenesulfonamide in combination with chemically diverse fragments against carbonic anhydrase by differential scanning fluorimetry. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 306-310.	5.2	5
1678	Native mass spectrometry of human carbonic anhydrase I and its inhibitor complexes. Journal of Biological Inorganic Chemistry, 2020, 25, 979-993.	2.6	5
1679	In Silico Identification and Biological Evaluation of Antioxidant Food Components Endowed with Human Carbonic Anhydrase IX and XII Inhibition. Antioxidants, 2020, 9, 775.	5.1	5
1680	Breakthroughs in Medicinal Chemistry: New Targets and Mechanisms, New Drugs, New Hopes–7. Molecules, 2020, 25, 2968.	3.8	5
1681	Aryl-4,5-dihydro-1H-pyrazole-1-carboxamide Derivatives Bearing a Sulfonamide Moiety Show Single-digit Nanomolar-to-Subnanomolar Inhibition Constants against the Tumor-associated Human Carbonic Anhydrases IX and XII. International Journal of Molecular Sciences, 2020, 21, 2621.	4.1	5
1682	Biochemical profiling of anti-HIV prodrug Elsulfavirine (Elpida [®]) and its active form VM1500A against a panel of twelve human carbonic anhydrase isoforms. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1056-1060.	5.2	5
1683	Benzyl alcohol inhibits carbonic anhydrases by anchoring to the zinc coordinated water molecule. Biochemical and Biophysical Research Communications, 2021, 548, 217-221.	2.1	5
1684	Synthesis and Human Carbonic Anhydrase I, II, IX, and XII Inhibition Studies of Sulphonamides Incorporating Mono-, Bi- and Tricyclic Imide Moieties. Pharmaceuticals, 2021, 14, 693.	3.8	5
1685	Mechanisms of the Antiproliferative and Antitumor Activity of Novel Telomerase–Carbonic Anhydrase Dual-Hybrid Inhibitors. Journal of Medicinal Chemistry, 2021, 64, 11432-11444.	6.4	5
1686	Quantum mechanical study on the activation mechanism of human carbonic anhydrase VII cluster model with bis-histamine schiff bases and bis-spinaceamine derivatives. Bioorganic and Medicinal Chemistry, 2021, 44, 116276.	3.0	5
1687	4â€Sulfamoylphenylalkylamides as Inhibitors of Carbonic Anhydrases Expressed in <i>Vibrio cholerae</i> . ChemMedChem, 2021, 16, 3787-3794.	3.2	5
1688	Discovery of potent nucleotide pyrophosphatase/phosphodiesterase3 (NPP3) inhibitors with ancillary carbonic anhydrase inhibition for cancer (immuno)therapy. RSC Medicinal Chemistry, 2021, 12, 1187-1206.	3.9	5
1689	A Novel Class of Dual-Acting DCH-CORMs Counteracts Oxidative Stress-Induced Inflammation in Human Primary Tenocytes. Antioxidants, 2021, 10, 1828.	5.1	5
1690	Chagas Disease: Drug Development and Parasite Targets. Topics in Medicinal Chemistry, 2022, , 1.	0.8	5
1691	Acipimox inhibits human carbonic anhydrases. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 672-679.	5.2	5
1692	Perspectives on the design and discovery of α-ketoamide inhibitors for the treatment of novel coronavirus: where do we stand and where do we go?. Expert Opinion on Drug Discovery, 2022, 17, 547-557.	5.0	5

#	Article	IF	CITATIONS
1693	Novel 1,3,5-Triazinyl Aminobenzenesulfonamides Incorporating Aminoalcohol, Aminochalcone and Aminostilbene Structural Motifs as Potent Anti-VRE Agents, and Carbonic Anhydrases I, II, VII, IX, and XII Inhibitors. International Journal of Molecular Sciences, 2022, 23, 231.	4.1	5
1694	The inhibitory effect of boric acid on hypoxia-regulated tumour-associated carbonic anhydrase IX. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1340-1345.	5.2	5
1695	Development of Praziquantel sulphonamide derivatives as antischistosomal drugs. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1479-1494.	5.2	5
1696	Carbonic Anhydrase Inhibitors. Part 541: Metal Complexes of Heterocyclic Sulfonamides: A New Class of Antiglaucoma Agents. Metal-Based Drugs, 1997, 4, 307-315.	3.8	4
1697	Carbonic Anhydrase Activity Modulators: Synthesis of Inhibitors and Activators Incorporating 2-substituted-thiazol-4-yl-methyl Scaffolds. Journal of Enzyme Inhibition and Medicinal Chemistry, 2001, 16, 351-358.	0.5	4
1698	Novel targets against Helicobacter pylori: a bioinformatic approach. Future Microbiology, 2007, 2, 111-114.	2.0	4
1699	QSAR studies on the activation of the human carbonic anhydrase cytosolic isoforms I and II and secretory isozyme VI with amino acids and amines. Bioorganic and Medicinal Chemistry, 2007, 15, 6501-6509.	3.0	4
1700	Bacterial Zinc Proteases and their Inhibition. Current Enzyme Inhibition, 2011, 7, 2-23.	0.4	4
1701	Amide derivatives of benzene-sulfonanilide, pharmaceutical composition thereof and method for cancer treatment using the same (US20120095092). Expert Opinion on Therapeutic Patents, 2012, 22, 1251-1255.	5.0	4
1702	Characterization of carbonic anhydrase from Turkish native "Gerze―chicken and influences of metal ions on enzyme activity. Journal of Enzyme Inhibition and Medicinal Chemistry, 2014, 29, 773-776.	5.2	4
1703	Carbonic Anhydrase IX: From Biology to Therapy. Cancer Drug Discovery and Development, 2014, , 121-153.	0.4	4
1704	Acatalytic Carbonic Anhydrases (CAs VIII, X, XI). , 2015, , 239-245.		4
1705	Editorial (Thematic Issue: Challenging Organic Syntheses and Pharmacological Applications of) Tj ETQq1 1 0.784	-314 rgBT 1.9	/Oyerlock 10
1706	Discovery of Strecker-type α-aminonitriles as a new class of human carbonic anhydrase inhibitors using differential scanning fluorimetry. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1707-1711.	5.2	4
1707	Kinetic and docking studies of cytosolic/tumor-associated carbonic anhydrase isozymes I, II and IX with some hydroxylic compounds. Journal of Enzyme Inhibition and Medicinal Chemistry, 2016, 31, 1214-1220.	5.2	4
1708	Dual targeting of cancer-related human matrix metalloproteinases and carbonic anhydrases by chiral <i>N</i> -(biarylsulfonyl)-phosphonic acids. Journal of Enzyme Inhibition and Medicinal Chemistry, 2017, 32, 1260-1264.	5.2	4
1709	Bioactive Natural Product and Superacid Chemistry for Lead Compound Identification: A Case Study of Selective hCA III and L-Type Ca2+ Current Inhibitors for Hypotensive Agent Discovery. Molecules, 2017, 22, 915.	3.8	4
1710	Novel method of treating macular degeneration: a patent evaluation (WO2018/107005). Expert Opinion on Therapeutic Patents, 2019, 29, 749-752.	5.0	4

#	Article	IF	CITATIONS
1711	Further validation of strecker-type α-aminonitriles as a new class of potent human carbonic anhydrase Il inhibitors: hit expansion within the public domain using differential scanning fluorimetry leads to chemotype refinement. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 165-171.	5.2	4
1712	Synthesis, Computational Studies and Assessment of <i>in Vitro</i> Activity of Squalene Derivatives as Carbonic Anhydrase Inhibitors. ChemMedChem, 2020, 15, 2052-2057.	3.2	4
1713	Sulfonamide Inhibition Studies of the β-Class Carbonic Anhydrase CAS3 from the Filamentous Ascomycete Sordaria macrospora. Molecules, 2020, 25, 1036.	3.8	4
1714	Activation studies of the β-carbonic anhydrases from Malassezia restricta with amines and amino acids. Journal of Enzyme Inhibition and Medicinal Chemistry, 2020, 35, 824-830.	5.2	4
1715	The possible role of methylglyoxal metabolism in cancer. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 2010-2015.	5.2	4
1716	Tetrahydroquinazole-based secondary sulphonamides as carbonic anhydrase inhibitors: synthesis, biological evaluation against isoforms I, II, IV, and IX, and computational studies. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1874-1883.	5.2	4
1717	Taurultams incorporating arylsulfonamide: First inÂvitro inhibition studies of α-, β- and γ-class Carbonic Anhydrases from Vibrio cholerae and Burkholderia pseudomallei. European Journal of Medicinal Chemistry, 2021, 219, 113444.	5.5	4
1718	Privileged scaffolds in medicinal chemistry: Studies on pyrazolo[1,5-a]pyrimidines on sulfonamide containing Carbonic Anhydrase inhibitors. Bioorganic and Medicinal Chemistry Letters, 2021, 49, 128309.	2.2	4
1719	Inhibition of the β-carbonic anhydrase from the protozoan pathogen <i>Trichomonas vaginalis</i> with sulphonamides. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 330-335.	5.2	4
1720	Biochemical and structural characterization of beta-carbonic anhydrase from the parasite Trichomonas vaginalis. Journal of Molecular Medicine, 2022, 100, 115-124.	3.9	4
1721	Design, synthesis and human carbonic anhydrase I, II, IX and XII inhibitory properties of 1,3-thiazole sulfonamides. Bioorganic and Medicinal Chemistry Letters, 2022, 59, 128581.	2.2	4
1722	A Series of Thiadiazolylâ€Benzenesulfonamides Incorporating an Aromatic Tail as Isoformâ€Selective, Potent Carbonic Anhydrase II/XII Inhibitors. ChemMedChem, 2022, , e202200056.	3.2	4
1723	Continued Structural Exploration of Sulfocoumarin as Selective Inhibitor of Tumor-Associated Human Carbonic Anhydrases IX and XII. Molecules, 2022, 27, 4076.	3.8	4
1724	Complexes With Biologically Active Ligands. Part 4. Coordination Compounds of Chlorothiazide With Transition Metal Ions Behave as Strong Carbonic Anhydrase Inhibitors. Metal-Based Drugs, 1996, 3, 79-83.	3.8	3
1725	Carbonic Anhydrase Activators. Part 191 Spectroscopic and Kinetic Investigations for the Interaction of Isozymes I and II With Primary Amines. Metal-Based Drugs, 1997, 4, 221-227.	3.8	3
1726	Carbonic anhydrase inhibitors. N-Cyanomethylsulfonamides—a new zinc binding group in the design of inhibitors targeting cytosolic and membrane-anchored isoforms. Journal of Enzyme Inhibition and Medicinal Chemistry, 2006, 21, 477-481.	5.2	3
1727	Update on the development of HIV entry inhibitors. Future HIV Therapy, 2008, 2, 479-507.	0.4	3
1728	Discovery of HIV Typeâ€1 Aspartic Protease Hit Compounds through Combined Computational Approaches. ChemMedChem, 2016, 11, 1646-1652.	3.2	3

#	Article	IF	CITATIONS
1729	Sequence Analysis, Kinetic Constants, and Anion Inhibition Profile of the Nacrein-Like Protein (CgiNAP2X1) from the Pacific Oyster Magallana gigas (Ex-Crassostrea gigas). Marine Drugs, 2017, 15, 270.	4.6	3
1730	Treatment of sleep apnea with a combination of a carbonic anhydrase inhibitor and an aldosterone antagonist: a patent evaluation of CA2958110 and IN6616DEN2012. Expert Opinion on Therapeutic Patents, 2018, 28, 723-727.	5.0	3
1731	Carbonic anhydrase inhibitors for the treatment of tumors. , 2019, , 331-365.		3
1732	Treatment of glaucoma and ocular hypertension using rho kinase inhibitors: patent evaluation of US2018244666 and US2018256595. Expert Opinion on Therapeutic Patents, 2019, 29, 753-759.	5.0	3
1733	Novel Indole-Based Hydrazones as Potent Inhibitors of the α-class Carbonic Anhydrase from Pathogenic Bacterium Vibrio cholerae. International Journal of Molecular Sciences, 2020, 21, 3131.	4.1	3
1734	Activation of the β-carbonic anhydrase from the protozoan pathogen <i>Trichomonas vaginalis</i> with amines and amino acids. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 758-763.	5.2	3
1735	Carbonic anhydrase activation profile of indole-based derivatives. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1783-1797.	5.2	3
1736	Synthesis and Enantioselective Pharmacokinetic/Pharmacodynamic Analysis of New CNS-Active Sulfamoylphenyl Carbamate Derivatives. International Journal of Molecular Sciences, 2021, 22, 3361.	4.1	3
1737	Carbonic Anhydrase IV Selective Inhibitors Counteract the Development of Colitis-Associated Visceral Pain in Rats. Cells, 2021, 10, 2540.	4.1	3
1738	A Simple Yet Multifaceted Enzyme. Revista De Chimie (discontinued), 2020, 71, 1-16.	0.4	3
1739	Metal Complexes of Heterocyclic Sulfonamides as Carbonic Anhydrase Inhibitors. , 0, , .		3
1740	An innovative spectroscopic approach for qualitative and quantitative evaluation of Mb-CO from myoglobin carbonylation reaction through chemometrics methods. Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy, 2022, 267, 120602.	3.9	3
1741	Inhibitory Effects of Sulfonamide Derivatives on the β-Carbonic Anhydrase (MpaCA) from Malassezia pachydermatis, a Commensal, Pathogenic Fungus Present in Domestic Animals. International Journal of Molecular Sciences, 2021, 22, 12601.	4.1	3
1742	Challenges and Promises for Obtaining New Antiprotozoal Drugs: What's Going Wrong?. Topics in Medicinal Chemistry, 2021, , 321-329.	0.8	3
1743	Carbonic Anhydrase Inhibitors Featuring a Porphyrin Scaffold: Synthesis, Optical and Biological Properties. European Journal of Organic Chemistry, 2022, 2022, .	2.4	3
1744	Small Molecule Alkoxy Oriented Selectiveness on Human Carbonic Anhydrase II and IX Inhibition. ChemMedChem, 2022, 17, .	3.2	3
1745	1,5â€Benzodiazepines as a platform for the design of carbonic anhydrase inhibitors. Archiv Der Pharmazie, 2022, 355, 2100405.	4.1	3
1746	Calixarenes Incorporating Sulfonamide Moieties: Versatile Ligands for Carbonic Anhydrases Inhibition. Chemistry - A European Journal, 2022, 28, .	3.3	3

#	Article	IF	CITATIONS
1747	New 1 <i>H</i> â€indoleâ€2,3â€dione 3â€thiosemicarbazones with 3â€sulfamoylphenyl moiety as selective carbo anhydrase inhibitors. Archiv Der Pharmazie, 2022, 355, e2200023.	nic 4.1	3
1748	The production and biochemical characterization of α-carbonic anhydrase from Lactobacillus rhamnosus GG. Applied Microbiology and Biotechnology, 2022, 106, 4065-4074.	3.6	3
1749	Synthesis and biological evaluation of sulfonamideâ€based compounds as inhibitors of carbonic anhydrase from <i>Vibrio cholerae</i> . Archiv Der Pharmazie, 2022, 355, .	4.1	3
1750	Application of LEDA algorithm for the recognition of P-glycoprotein and Carbonic Anhydrase hybrid inhibitors and evaluation of their plasma stability by HPLC-MS/MS analysis. Journal of Pharmaceutical and Biomedical Analysis, 2022, 219, 114887.	2.8	3
1751	Mechanism and Inhibition of the $\hat{1}^2$ -Class and $\hat{1}^3$ -Class Carbonic Anhydrases. , 0, , 285-300.		2
1752	Therapeutic compounds: patent evaluation of WO2011011652A1. Expert Opinion on Therapeutic Patents, 2011, 21, 1491-1495.	5.0	2
1753	Carbonic Anhydrase II as Target for Drug Design. , 2015, , 51-90.		2
1754	Bacterial Carbonic Anhydrases as Drug Targets. , 2015, , 275-288.		2
1755	Anion and sulfonamide inhibition studies of an α-carbonic anhydrase from the Antarctic hemoglobinless fish Chionodraco hamatus. Bioorganic and Medicinal Chemistry Letters, 2015, 25, 5485-5489.	2.2	2
1756	Bacterial Carbonic Anhydrases. Topics in Medicinal Chemistry, 2016, , 135-152.	0.8	2
1757	Sulfonamide inhibition studies of the α-carbonic anhydrase from the gammaproteobacterium Thiomicrospira crunogena XCL-2, TcruCA. Bioorganic and Medicinal Chemistry Letters, 2016, 26, 401-405.	2.2	2
1758	Carbonic anhydrase enzymes for regulating mast cell hematopoiesis and type-2 inflammation: a patent evaluation (WO2017/058370). Expert Opinion on Therapeutic Patents, 2018, 28, 741-743.	5.0	2
1759	Carbonic anhydrases from pathogens. , 2019, , 387-417.		2
1760	Carbonic anhydrase inhibitors for the treatment of neuropathic pain and arthritis. , 2019, , 367-386.		2
1761	Discovery of New 1,1′-Biphenyl-4-sulfonamides as Selective Subnanomolar Human Carbonic Anhydrase II Inhibitors. ACS Medicinal Chemistry Letters, 2020, 11, 633-637.	2.8	2
1762	The crystal structures of 2-(4-benzhydrylpiperazin-1-yl)- <i>N</i> -(4-sulfamoylphenyl)acetamide in complex with human carbonic anhydrase II and VII provide insights into selective CA inhibitor development. New Journal of Chemistry, 2021, 45, 147-152.	2.8	2
1763	Synthesis of Azasugar–Sulfonamide conjugates and their Evaluation as Inhibitors of Carbonic Anhydrases: the Azasugar Approach to Selectivity. European Journal of Organic Chemistry, 2021, 2021, 2604-2614.	2.4	2
1764	Design, synthesis and biochemical evaluation of novel carbonic anhydrase inhibitors triggered by structural knowledge on hCA VII. Bioorganic and Medicinal Chemistry, 2021, 44, 116279.	3.0	2

#	Article	IF	CITATIONS
1765	Evaluating the efficiency of enzyme accelerated CO2 capture: chemical kinetics modelling for interpreting measurement results. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 394-401.	5.2	2
1766	New Histamine-Related Five-Membered N-Heterocycle Derivatives as Carbonic Anhydrase I Activators. Molecules, 2022, 27, 545.	3.8	2
1767	Designing of Novel Carbonic Anhydrase Inhibitors and Activators. Current Medicinal Chemistry Cardiovascular and Hematological Agents, 2004, 2, 51-70.	1.7	2
1768	5-(Sulfamoyl)thien-2-yl 1,3-oxazole inhibitors of carbonic anhydrase II with hydrophilic periphery. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 1005-1011.	5.2	2
1769	Benzoselenoates: A novel class of carbonic anhydrase inhibitors. Bioorganic Chemistry, 2022, 122, 105751.	4.1	2
1770	Heterobimetallic complexes containing organometallic acylhydrazone ligands as potential inhibitors of human carbonic anhydrases. Journal of Inorganic Biochemistry, 2022, 232, 111814.	3.5	2
1771	Carbonic Anhydrase VII. , 2015, , 151-168.		1
1772	Protozoan Carbonic Anhydrases. Topics in Medicinal Chemistry, 2016, , 111-133.	0.8	1
1773	Prostaglandins with Carboxylic Functionalities for the Treatment of Claucoma. , 0, , 269-279.		1
1774	Carbonic anhydrases from pathogens. , 2019, , 419-448.		1
1775	Mechanism of action of carbonic anhydrase inhibitors. , 2019, , 245-255.		1
1776	Î-Carbonic anhydrases. , 2019, , 107-129.		1
1777	A measurement system for the evaluation of efficiency of enzyme accelerated CO2 capture systems based on modeling. , 2020, , .		1
1778	Modulating the Efficacy of Carbonic Anhydrase Inhibitors through Fluorine Substitution. Angewandte Chemie, 2021, 133, 23252.	2.0	1
1779	QM and QM/MM study on inhibition mechanism of polyphenolic compounds as non-classical inhibitors of \hat{I}_{\pm} -human carbonic anhydrase (II). Theoretical Chemistry Accounts, 2021, 140, 1.	1.4	1
1780	CO2 permeability of the rat erythrocyte membrane and its inhibition. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 1602-1606.	5.2	1
1781	Vanillin enones as selective inhibitors of the cancer associated carbonic anhydrase isoforms IX and XII. The out of the active site pocket for the design of selective inhibitors?. Journal of Enzyme Inhibition and Medicinal Chemistry, 2021, 36, 2118-2127.	5.2	1
1782	Synthesis and Inhibition Activity Study of Triazinyl-Substituted Amino(alkyl)-benzenesulfonamide Conjugates with Polar and Hydrophobic Amino Acids as Inhibitors of Human Carbonic Anhydrases I, II, IV, IX, and XII. International Journal of Molecular Sciences, 2021, 22, 11283.	4.1	1

#	Article	IF	CITATIONS
1783	Targeting Carbonic Anhydrases from Trypanosoma cruzi and Leishmania spp. as a Therapeutic Strategy to Obtain New Antiprotozoal Drugs. Topics in Medicinal Chemistry, 2021, , 1.	0.8	1
1784	2-(2-Hydroxyethyl)piperazine derivatives as potent human carbonic anhydrase inhibitors: Synthesis, enzyme inhibition, computational studies and antiglaucoma activity. European Journal of Medicinal Chemistry, 2022, 228, 114026.	5.5	1
1785	Design, synthesis, SAR, and biological evaluation of saccharinâ€based hybrids as carbonic anhydrase inhibitors. Archiv Der Pharmazie, 2022, , e2200019.	4.1	1
1786	Carbonic Anhydrase Inhibitors. ChemInform, 2003, 34, no.	0.0	0
1787	Protease Inhibitors of the Sulfonamide Type: Anticancer, Antiinflammatory, and Antiviral Agents. ChemInform, 2003, 34, no.	0.0	0
1788	APOBEC3G: A Promising Antiviral Target. , 0, , 981-987.		0
1789	QSAR of Carbonic Anhydrase Inhibitors and Their Impact on Drug Design. , 0, , 375-397.		0
1790	Selectivity Issues in the Design of CA Inhibitors. , 0, , 399-413.		0
1791	Heterocyclic urea derivatives and methods of use thereof (WO2010142978). Expert Opinion on Therapeutic Patents, 2012, 22, 193-197.	5.0	0
1792	Tumor Microenvironment as Target in Cancer Therapy. Annual Reports in Medicinal Chemistry, 2014, 49, 269-284.	0.9	0
1793	Carbonic Anhydrases From Extremophiles and Their Biotechnological Applications. , 2015, , 311-324.		0
1794	Carbonic anhydrase inhibitors as diuretics. , 2019, , 287-309.		0
1795	Carbonic anhydrase activators and their potential in the pharmaceutical field. , 2019, , 477-492.		0
1796	Biotechnologic applications of carbonic anhydrases from extremophiles. , 2019, , 495-514.		0
1797	Mechanisms of action of carbonic anhydrase inhibitors. , 2019, , 223-243.		0
1798	Nanostructures and innovative delivery systems for overcoming cancer resistance. , 2021, , 185-201.		0
1799	A Story on Carbon Dioxide and Its Hydration. , 2021, , 115-131.		0
1800	Design, synthesis, and biological evaluation of selective hCA IX inhibitors. , 2021, , 63-78.		0

1800 Design, synthesis, and biological evaluation of selective hCA IX inhibitors. , 2021, , 63-78.

#	Article	IF	CITATIONS
1801	Small molecules and monoclonal antibodies as selective hCA XII inhibitors: An update. , 2021, , 79-94.		0
1802	CDCA1 From Thalassiosira weissflogii as Representative Member of ζ-Class CAs: General Features and Biotechnological Applications. , 2015, , 351-359.		0
1803	Carbonic Anhydrase Inhibitors: Identifying Therapeutic Cancer Agents Through Virtual Screening. Progress in Drug Research Fortschritte Der Arzneimittelforschung Progres Des Recherches Pharmaceutiques, 2021, , 237-252.	0.6	Ο
1804	Beta-Carbonic Anhydrase 1 from Trichomonas Vaginalis as New Antiprotozoan Drug Target. Topics in Medicinal Chemistry, 2021, , 1.	0.8	0
1805	ĥ-Class Carbonic Anhydrases as Antiplasmodial Drug Targets: Current State of the Art and Hurdles to Develop New Antimalarials. Topics in Medicinal Chemistry, 2021, , 1.	0.8	0
1806	Diversely substituted sulfamides for fragment-based drug discovery of carbonic anhydrase inhibitors: synthesis and inhibitory profile. Journal of Enzyme Inhibition and Medicinal Chemistry, 2022, 37, 857-865.	5.2	0