Christine Guérard-Hélaine

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/3502291/publications.pdf

Version: 2024-02-01

19 papers 556 citations

687363 13 h-index 752698 20 g-index

20 all docs 20 docs citations

20 times ranked 408 citing authors

#	Article	IF	Citations
1	Asymmetric Self―and Crossâ€Aldol Reactions of Glycolaldehyde Catalyzed by <scp>D</scp> â€Fructoseâ€6â€phosphate Aldolase. Angewandte Chemie - International Edition, 2009, 48, 5521-5525.	13.8	116
2	A Mutant <scp>D</scp> â€Fructoseâ€6â€Phosphate Aldolase (Ala129Ser) with Improved Affinity towards Dihydroxyacetone for the Synthesis of Polyhydroxylated Compounds. Advanced Synthesis and Catalysis, 2010, 352, 1039-1046.	4.3	90
3	Oneâ€Pot Cascade Reactions using Fructoseâ€6â€phosphate Aldolase: Efficient Synthesis of <scp>D</scp> â€Arabinose 5â€Phosphate, <scp>D</scp> â€Fructose 6â€Phosphate and Analogues. Advanced Synthesis and Catalysis, 2012, 354, 1725-1730.	4.3	47
4	Expanding the reaction space of aldolases using hydroxypyruvate as a nucleophilic substrate. Green Chemistry, 2017, 19, 519-526.	9.0	30
5	Breaking the Dogma of Aldolase Specificity: Simple Aliphatic Ketones and Aldehydes are Nucleophiles for Fructoseâ€6ã€phosphate Aldolase. Chemistry - A European Journal, 2017, 23, 5005-5009.	3.3	29
6	Biocatalytic Aldol Addition of Simple Aliphatic Nucleophiles to Hydroxyaldehydes. ACS Catalysis, 2018, 8, 8804-8809.	11.2	25
7	Genome Mining for Innovative Biocatalysts: New Dihydroxyacetone Aldolases for the Chemist's Toolbox. ChemCatChem, 2015, 7, 1871-1879.	3.7	23
8	Synthesis of Branchedâ€Chain Sugars with a DHAPâ€Dependent Aldolase: Ketones are Electrophile Substrates of Rhamnuloseâ€1â€phosphate Aldolases. Angewandte Chemie - International Edition, 2018, 57, 5467-5471.	13.8	23
9	Recent Advances in the Substrate Selectivity of Aldolases. ACS Catalysis, 2022, 12, 733-761.	11.2	22
10	Straightforward Synthesis of Terminally Phosphorylated <scp>L</scp> â€Sugars <i>via</i> Multienzymatic Cascade Reactions. Advanced Synthesis and Catalysis, 2015, 357, 1703-1708.	4.3	21
11	<scp>L</scp> â€Rhamnuloseâ€1â€phosphate Aldolase from <i>Thermotoga maritima</i> in Organic Synthesis: Oneâ€Pot Multistep Reactions for the Preparation of Imino―and Nitrocyclitols. Advanced Synthesis and Catalysis, 2015, 357, 1951-1960.	4.3	18
12	Transketolase–Aldolase Symbiosis for the Stereoselective Preparation of Aldoses and Ketoses of Biological Interest. Advanced Synthesis and Catalysis, 2017, 359, 2061-2065.	4.3	13
13	Pyruvate Aldolases Catalyze Cross-Aldol Reactions between Ketones: Highly Selective Access to Multi-Functionalized Tertiary Alcohols. ACS Catalysis, 2020, 10, 2538-2543.	11.2	13
14	2-Deoxyribose-5-phosphate aldolase, a remarkably tolerant aldolase towards nucleophile substrates. Chemical Communications, 2019, 55, 7498-7501.	4.1	12
15	Mixing chemo- and biocatalysis for rare monosaccharide production by combining aldolase and N-heterocyclic carbene gold catalysts. Green Chemistry, 2022, 24, 3634-3639.	9.0	8
16	Synthesis of Branchedâ€Chain Sugars with a DHAPâ€Dependent Aldolase: Ketones are Electrophile Substrates of Rhamnuloseâ€1â€phosphate Aldolases. Angewandte Chemie, 2018, 130, 5565-5569.	2.0	7
17	Convergent inâ€situ Generation of Both Transketolase Substrates via Transaminase and Aldolase Reactions for Sequential Oneâ€Pot, Threeâ€6tep Cascade Synthesis of Ketoses. ChemCatChem, 2020, 12, 812-817.	3.7	7
18	Achiral Hydroxypyruvaldehyde Phosphate as a Platform for Multi-Aldolases Cascade Synthesis of Diuloses and for a Quadruple Acetaldehyde Addition Catalyzed by 2-Deoxyribose-5-Phosphate Aldolases. ACS Catalysis, 2019, 9, 9508-9512.	11.2	6

#	Article	lF	CITATIONS
19	One Step Forward in Exploration of Class II Pyruvate Aldolases Nucleophile and Electrophile Substrate Specificity. ChemCatChem, 2021, 13, 3920-3924.	3.7	3