Francesca Cardona

List of Publications by Year
in descending order

Source: https://exaly.com/author-pdf/5633892/publications.pdf

Version: 2024-02-01

112 papers	4,552 citations	117625 34 h-index	114465 63 g-index
145 all docs	145 docs citations	145 times ranked	3922 citing authors

#	Article	IF	Citations
1	Transition metal based catalysts in the aerobic oxidation of alcohols. Green Chemistry, 2012, 14, 547.	9.0	597
2	Metal-catalysed 1,2-diamination reactions. Nature Chemistry, 2009, 1, 269-275.	13.6	325
3	Stereocontrolled Cyclic Nitrone Cycloaddition Strategy for the Synthesis of Pyrrolizidine and Indolizidine Alkaloids. Chemistry - A European Journal, 2009, 15, 7808-7821.	3.3	229
4	A step forward towards sustainable aerobic alcohol oxidation: new and revised catalysts based on transition metals on solid supports. Green Chemistry, 2017, 19, 2030-2050.	9.0	156
5	Total syntheses of hyacinthacine A2 and 7-deoxycasuarine by cycloaddition to a carbohydrate derived nitrone. Tetrahedron Letters, 2003, 44, 2315-2318.	1.4	141
6	The Discovery of Novel Metal-Induced Reactions of Nitrones: Not Only Electrophiles and Reagents for [3+2] Cycloadditions. Angewandte Chemie - International Edition, 2005, 44, 7832-7835.	13.8	132
7	Nucleophilic Additions to Cyclic Nitrones en Route to Iminocyclitols â€“ Total Syntheses of DMDP, 6â€deoxyâ€DMDP, DABâ€1, CYBâ€3, Nectrisine, and Radicamine B. European Journal of Organic Chemistry, 2008, 2008, 2929-2947.	2.4	119
8	Total Syntheses of Casuarine and Its 6â€Oâ€Glucoside: Complementary Inhibition towards Glycoside Hydrolases of the GH31 and GH37 Families. Chemistry - A European Journal, 2009, 15, 1627-1636.	3.3	92
9	Catalytic Oxidation of Imines Based on Methyltrioxorhenium/Urea Hydrogen Peroxide:Â A Mild and Easy Chemo- and Regioselective Entry to Nitrones. Organic Letters, 2007, 9, 473-476.	4.6	91
10	Iterative Organometallic Addition to Chiral Hydroxylated Cyclic Nitrones:â€‰ Highly Stereoselective Syntheses of Î±,Î±â€˜- and Î±,Î±-Substituted Hydroxypyrrolidines. Organic Letters, 2003, 5, 4235-4238.	4.6	77
11	Indium-Mediated Reduction of Hydroxylamines to Amines. Organic Letters, 2003, 5, 1773-1776.	4.6	76
12	New Concise Total Synthesis of (+)-Lentiginosine and Some Structural Analogues. Journal of Organic Chemistry, 2005, 70, 6552-6555.	3.2	72
13	(+)â€Lentiginosine, a Potent and Selective Inhibitor of Amyloglucosidase: Synthetic Efforts and Disputes on Its Absolute Configuration. European Journal of Organic Chemistry, 2007, 2007, 1551-1565.	2.4	72
14	(1S,2S,7R,8aS)- and (1S,2S,7S,8aS)-trihydroxyoctahydroindolizine: Two new glycosidase inhibitors by nitrone cycloaddition strategy. Tetrahedron: Asymmetry, 1996, 7, 1659-1674.	1.8	69
15	Straightforward Access to Enantiomerically Pure, Highly Functionalized Pyrrolizidines by Cycloaddition of Maleic Acid Esters to PyrrolineN-Oxides Derived from Tartaric, Malic and Aspartic Acids â†' Synthesis of (â†')-Hastanecine, 7-epi-Croalbinecine and (â†')-Croalbinecine. European Journal of Organic Chemistry, 2000, 2000, 3633-3645.	2.4	64
16	Oxidation ofN,N-Disubstituted Hydroxylamines to Nitrones with Hydrogen Peroxide Catalyzed by Polymer-Supported Methylrhenium Trioxide Systems. Advanced Synthesis and Catalysis, 2004, 346, 639-647.	4.3	58
17	Total Synthesis of (â†')-Rosmarinecine by Intramolecular Cycloaddition of (S)-Malic Acid Derived Pyrroline N-Oxide. Organic Letters, 2001, 3, 1367-1369.	4.6	56
18	Improved Syntheses of (+)-Lentiginosine and (1S,2S,7R,8aS)-Trihydroxyoctahydroindolizine by Butenol Cycloaddition to Enantiopure Protected Dihydroxy Pyrroline N-Oxides. Synlett, 1996, 1996, 761-763.	1.8	55

#	Article	IF	Citations
19	Are enzymes sensitive to the multivalent effect? Emerging evidence with glycosidases. Tetrahedron Letters, 2016, 57, 5407-5415.	1.4	54
20	A convenient access to (3S)-3-(triisopropylsilyl)oxy-1-pyrroline N-oxide, a useful intermediate for polyfunctionalized enantiopure indolizidine and pyrrolizidine synthesis. Tetrahedron Letters, 1999, 40, 2853-2856.	1.4	53
21	Novel S-acyl glutathione derivatives prevent amyloid oxidative stress and cholinergic dysfunction in Alzheimer disease models. Free Radical Biology and Medicine, 2012, 52, 1362-1371.	2.9	52
22	Stereocomplementary Routes to Hydroxylated Nitrogen Heterocycles: Total Syntheses of Casuarine, Australine, and 7â€epiâ€Australine. Chemistry - A European Journal, 2013, 19, 10595-10604.	3.3	52
23	Oxidation of N,N-Disubstituted Hydroxylamines to Nitrones with Hypervalent Iodine Reagents. Organic Letters, 2015, 17, 4082-4085.	4.6	52
24	Straightforward Synthesis of (1â†'2)-Linked Pseudo Aza-C-disaccharides by the Novel Cycloaddition of Enantiopure Cyclic Nitrones to Glycals. Journal of Organic Chemistry, 1998, 63, 7311-7318.	3.2	50
25	Synthesis, Biological Evaluation and Docking Studies of Casuarine Analogues: Effects of Structural Modifications at Ring B on Inhibitory Activity Towards Glucoamylase. European Journal of Organic Chemistry, 2010, 2010, 5574-5585.	2.4	47
26	Human Acid Î²â€Glucosidase Inhibition by Carbohydrate Derived Iminosugars: Towards New Pharmacological Chaperones for Gaucher Disease. ChemBioChem, 2015, 16, 2054-2064.	2.6	45
27	The novel proapoptotic activity of nonnatural enantiomer of Lentiginosine. Glycobiology, 2010, 20, 500-506.	2.5	44
28	From glycals to aminosugars: a challenging test for new stereoselective aminohydroxylation and related methodologies. Organic and Biomolecular Chemistry, 2016, 14, 5186-5204.	2.8	44
29	Oxidation of hydroxylamines to nitrones catalyzed by (salen)Mn(III) complexes. Enantioselective synthesis of a protected cis-dihydroxypyrroline N-oxide with jacobsen catalyst. Tetrahedron Letters, 1999, 40, 1989-1992.	1.4	41
30	Casuarine-6-O-Î±-d-glucoside and its analogues are tight binding inhibitors of insect and bacterial trehalases. Chemical Communications, 2010, 46, 2629.	4.1	40
31	Building Multivalent Iminosugar-Based Ligands on Calixarene Cores via Nitrone Cycloadditions. Journal of Organic Chemistry, 2012, 77, 6980-6988.	3.2	40
32	Oneâ€Pot Synthesis of Nitrones from Primary Amines and Aldehydes Catalyzed by Methyltrioxorhenium. ChemSusChem, 2008, 1, 327-332.	6.8	38
33	Natural Iminosugar (+)-Lentiginosine Inhibits ATPase and Chaperone Activity of Hsp90. PLoS ONE, 2012, 7, e43316.	2.5	38
34	A membrane-bound trehalase from Chironomus riparius larvae: purification and sensitivity to inhibition. Glycobiology, 2010, 20, 1186-1195.	2.5	36
35	Total Synthesis of (+)â€Hyacinthacine A₁, (+)â€7aâ€epiâ€Hyacinthacine A₁, (6R)â€6â€Hydroxyhyacinthacine A₁ and (6S)â€6â€Hydroxyâ€7aâ€epiâ€hyacinthacine A₁. European Journal of Organic Chemistry, 2011, 2011, 7155-7162.	2.4	36
36	Double Reductive Amination and Selective Strecker Reaction of a <scp>D</scp>â€Lyxaric Aldehyde: Synthesis of Diversely Functionalized 3,4,5â€Trihydroxypiperidines. European Journal of Organic Chemistry, 2012, 2012, 3920-3924.	2.4	36

#	Article	IF	Citations
37	Nucleophilic Additions and Redox Reactions of Polyhydroxypyrroline N-Oxides on the Way to Pyrrolidine Alkaloids: Total Synthesis of Radicamine B. Synlett, 2007, 2007, 2651-2654.	1.8	35
38	Polyhydroxypyrrolidine Glycosidase Inhibitors Related to (+)-Lentiginosine. Journal of Carbohydrate Chemistry, 2000, 19, 585-601.	1.1	33
39	Methyltrioxorhenium catalyzed domino epoxidation-nucleophilic ring opening of glycals. Tetrahedron Letters, 2003, 44, 5589-5592.	1.4	32
40	Hydrogen Peroxide in Green Oxidation Reactions: Recent Catalytic Processes. , 2008, , 191-212.		32
41	Total Synthesis of (â˜')-Uniflorine A. Journal of Natural Products, 2009, 72, 2058-2060.	3.0	32
42	Polyhydroxyaminoâ€Piperidineâ€Type Iminosugars and Pipecolic Acid Analogues from a <scp>D</scp>â€Mannoseâ€Derived Aldehyde. European Journal of Organic Chemistry, 2014, 2014, 5419-5432.	2.4	32
43	Mechanistic Insight into the Binding of Multivalent Pyrrolidines to Î±â€Mannosidases. Chemistry - A European Journal, 2017, 23, 14585-14596.	3.3	32
44	Dual targeting of PTP1B and glucosidases with new bifunctional iminosugar inhibitors to address type 2 diabetes. Bioorganic Chemistry, 2019, 87, 534-549.	4.1	32
45	Diastereoselection in 1,3-dipolar cycloadditions of a chiral cyclic nitrone to Î±,Î²-unsaturated Î´-lactones. Tetrahedron: Asymmetry, 2000, 11, 2015-2022.	1.8	31
46	Synthesis and Glycosidase Inhibition Studies of 5â€Methylâ€Substituted Tetrahydroxyindolizidines and â€pyrrolizidines Related to Natural Hyacinthacines B. European Journal of Organic Chemistry, 2013, 2013, 4047-4056.	2.4	31
47	Methyltrioxorhenium-Catalyzed Epoxidation-Methanolysis of Glycals under Homogeneous and Heterogeneous Conditions. Advanced Synthesis and Catalysis, 2006, 348, 476-486.	4.3	30
48	1,3-Dipolar cycloaddition of a nitrone derived from (S)-malic acid to Î±,Î²-unsaturated Î´-lactones. Tetrahedron: Asymmetry, 2001, 12, 3163-3172.	1.8	29
49	Kinetic Resolutions by Means of Cycloaddition Reactions. European Journal of Organic Chemistry, 2001, 2001, 2999.	2.4	28
50	6-Azido hyacinthacine A₂gives a straightforward access to the first multivalent pyrrolizidine architectures. Organic and Biomolecular Chemistry, 2014, 12, 6250.	2.8	27
51	Cycloadditions of Sugarâ€Derived ÂNitrones Targeting Polyhydroxylated Indolizidines. European Journal of Organic Chemistry, 2016, 2016, 1588-1598.	2.4	27
52	Complete Stereoselective Synthesis of Quasi-Enantiomeric Pseudo Imino-C-disaccharides: Parallel Kinetic Resolution of a Racemiccis-DihydroxypyrrolineN-Oxide by 1,2-Glycals. European Journal of Organic Chemistry, 1999, 1999, 1319-1323.	2.4	24
53	Alkoxyallene-Based Stereodivergent Syntheses of (â˜')-Hyacinthacine B₄ and of Putative Hyacinthacine C₅ Epimers: Proposal of Hyacinthacine C₅ Structure. Journal of Organic Chemistry, 2017, 82, 5835-5844.	3.2	24
54	Methyltrioxorhenium-Catalyzed Oxidation of Aromatic Aldoximes. Synlett, 2004, 2004, 1553-1556.	1.8	23

#	Article	IF	Citations
55	Quasienantiomeric Levoglucosenone and Isolevoglucosenone Allow the Parallel Kinetic Resolution of a Racemic Nitrone. Journal of Organic Chemistry, 2008, 73, 1999-2002.	3.2	23
56	New Frontiers on Human Safe Insecticides and Fungicides: An Opinion on Trehalase Inhibitors. Molecules, 2020, 25, 3013.	3.8	23
57	New Access to Aza-C-disaccharides by Cycloadditions of Pyrroline N-Oxides to Glycals. Tetrahedron Letters, 1997, 38, 8097-8100.	1.4	22
58	Synthesis and biological evaluation of nojirimycin- and pyrrolidine-based trehalase inhibitors. Beilstein Journal of Organic Chemistry, 2012, 8, 514-521.	2.2	22
59	Catalytic Oxidationâ˜Phosphorylation of Glycals:â€‰ Rate Acceleration and Enhancement of Selectivity with Added Nitrogen Ligands in Common Organic Solvents. Organic Letters, 2005, 7, 725-728.	4.6	21
60	Evidence for a multivalent effect in inhibition of sulfatases involved in lysosomal storage disorders (LSDs). RSC Advances, 2016, 6, 64847-64851.	3.6	20
61	Multimerization of DAB-1 onto Au GNPs affords new potent and selective N-acetylgalactosamine-6-sulfatase (GALNS) inhibitors. Organic and Biomolecular Chemistry, 2018, 16, 8604-8612.	2.8	20
62	Stereoselective Synthesis of C-2 Alkylated Trihydroxypiperidines: Novel Pharmacological Chaperones for Gaucher Disease. ACS Medicinal Chemistry Letters, 2019, 10, 621-626.	2.8	20
63	Reductive Amination Routes in the Synthesis of Piperidine IminoSugars. European Journal of Organic Chemistry, 2020, 2020, 4447-4462.	2.4	20
64	Molecular Dynamics Simulations on the Complexes of Glucoamylase II (471) from Aspergillus awamori var. X100 with 1-Deoxynojirimycin and Lentiginosine. Journal of Molecular Modeling, 1997, 3, 249-260.	1.8	18
65	Tetra-n-Propylammonium Perruthenate (TPAP) Catalyzed Aerobic Oxidation of Hydroxylamines to Nitrones. Letters in Organic Chemistry, 2006, 3, 118-120.	0.5	17
66	Nitrone Cycloadditions to Isolevoglucosenone:â€‰ Ready Access to a New Class of Directly Linked (1â†'3)-Imino-C-disaccharides. Organic Letters, 2003, 5, 1475-1478.	4.6	16
67	New synthesis and biological evaluation of uniflorine A derivatives: towards specific insect trehalase inhibitors. Organic and Biomolecular Chemistry, 2015, 13, 886-892.	2.8	16
68	Iminoâ€•and Azasugar Protonation Inside Human Acid Î²â€Glucosidase, the Enzyme that is Defective in Gaucher Disease. Angewandte Chemie - International Edition, 2020, 59, 10466-10469.	13.8	16
69	Glucocerebrosidase (GCase) activity modulation by 2-alkyl trihydroxypiperidines: Inhibition and pharmacological chaperoning. Bioorganic Chemistry, 2020, 98, 103740.	4.1	16
70	Synthesis of multimeric pyrrolidine iminosugar inhibitors of human Î²-glucocerebrosidase and Î±-galactosidase A: First example of a multivalent enzyme activity enhancer for Fabry disease. European Journal of Medicinal Chemistry, 2020, 192, 112173.	5.5	16
71	Synthesis of (Z)-3-Deoxy-3-(1,2,3,6-Tetradeoxy-3,6-Imino-L-Arabino-Hexitol-1-C-Ylidene)-D-Xylo-Hexose Derivatives. First Examples Of Homo-(1â†'3)-C-Linked Iminodisaccharides.. Journal of Carbohydrate Chemistry, 2000, 19, 555-571.	1.1	15
72	(â˜)â€(1R,2R,7S,8aR)â€1,2,7â€Trihydroxyindolizidine ((â˜)â€7Sâ€OHâ€Lentiginosine): Synthesis and Proapoptotic Activity. ChemPlusChem, 2012, 77, 224-233.	2.8	15

#	Article	IF	Citations
73	Remarkable High-pressure Enhancement of Enantiopure Nitrone Cycloadditions to Glycals: General Access to (1 â†' 2)-Linked Pseudo Aza-C-disaccharides. Synlett, 1998, 1998, 1444-1446.	1.8	14
74	On the Oxidation of Hydroxylamines with o-Iodoxybenzoic Acid (IBX). Synthesis, 2017, 49, 2890-2900.	2.3	14
75	Fmoc-protected iminosugar modified asparagine derivatives as building blocks for glycomimetics-containing peptides. Bioorganic and Medicinal Chemistry, 2007, 15, 3965-3973.	3.0	13
76	Ionic liquids in methyltrioxorhenium catalyzed epoxidationâ€"methanolysis of glycals under homogeneous and heterogeneous conditions. Journal of Molecular Catalysis A, 2008, 284, 108-115.	4.8	13
77	Gold nanoparticles are suitable cores for building tunable iminosugar multivalency. RSC Advances, 2015, 5, 95817-95822.	3.6	13
78	Synthesis of Novel Iminosugarâ€Based Trehalase Inhibitors by Crossâ€Metathesis Reactions. European Journal of Organic Chemistry, 2011, 2011, 3995-4000.	2.4	12
79	Exploring architectures displaying multimeric presentations of a trihydroxypiperidine iminosugar. Beilstein Journal of Organic Chemistry, 2015, 11, 2631-2640.	2.2	12
80	Osmium-Catalyzed Tethered Aminohydroxylation of Glycals: A Stereodirected Access to 2- and 3-Aminosugars. Organic Letters, 2015, 17, 728-731.	4.6	12
81	Structural basis of the inhibition of GH1 Î²-glucosidases by multivalent pyrrolidine iminosugars. Bioorganic Chemistry, 2019, 89, 103026.	4.1	12
82	Glycomimetic Based Approach toward Selective Carbonic Anhydrase Inhibitors. ACS Medicinal Chemistry Letters, 2020, 11, 727-731.	2.8	12
83	Synthesis of (1Ã†3)-C and Homo-(1Ã†3)-C-linked Imino-disaccharides Starting from Levoglucosenone and Isolevoglucosenone. Heterocycles, 2002, 56, 181.	0.7	12
84	GCase Enhancers: A Potential Therapeutic Option for Gaucher Disease and Other Neurological Disorders. Pharmaceuticals, 2022, 15, 823.	3.8	12
85	Synthesis of densely functionalized enantiopure indolizidines by ring-closing metathesis (RCM) of hydroxylamines from carbohydrate-derived nitrones. Beilstein Journal of Organic Chemistry, 2007, 3, 44.	2.2	11
86	Gold Supported on Silica Catalyzes the Aerobic Oxidation of N,Nâ€Disubstituted Hydroxylamines to Nitrones. European Journal of Organic Chemistry, 2015, 2015, 6541-6546.	2.4	11
87	Accessing 2-substituted piperidine iminosugars by organometallic addition/intramolecular reductive amination: aldehyde vs. nitrone route. Organic and Biomolecular Chemistry, 2017, 15, 9121-9126.	2.8	11
88	Piperidine Azasugars Bearing Lipophilic Chains: Stereoselective Synthesis and Biological Activity as Inhibitors of Glucocerebrosidase (GCase). Journal of Organic Chemistry, 2021, 86, 12745-12761.	3.2	11
89	Diruthenium Diacetate Catalysed Aerobic Oxidation of Hydroxylamines and Improved Chemoselectivity by Immobilisation to Lysozyme. ChemCatChem, 2017, 9, 4225-4230.	3.7	10
90	Oxidation of N,N-Disubstituted Hydroxylamines to Nitrones: The Search for More Sustainable Selective and Practical Stoichiometric Oxidants. Chimia, 2017, 71, 558.	0.6	10

#	Article	IF	Citations
91	N-Bridged 1-deoxynojirimycin dimers as selective insect trehalase inhibitors. Carbohydrate Research, 2014, 389, 46-49.	2.3	9
92	Probing the Influence of Linker Length and Flexibility in the Design and Synthesis of New Trehalase Inhibitors. Molecules, 2018, 23, 436.	3.8	9
93	Allyl Cyanate/Isocyanate Rearrangement in Glycals: Stereoselective Synthesis of 1-Amino and Diamino Sugar Derivatives. Organic Letters, 2020, 22, 9041-9046.	4.6	9
94	Photoswitchable inhibitors of human Î²-glucocerebrosidase. Organic and Biomolecular Chemistry, 2022, 20, 1637-1641.	2.8	9
95	3,4,5â€Trihydroxypiperidine Based Multivalent Glucocerebrosidase (GCase) Enhancers. ChemBioChem, 2022, 23, .	2.6	8
96	Hybrid Multivalent Jack Bean Î±-Mannosidase Inhibitors: The First Example of Gold Nanoparticles Decorated with Deoxynojirimycin Inhitopes. Molecules, 2021, 26, 5864.	3.8	7
97	Enantiopure Pyrroline-N-Oxides for the Synthesis of Pyrrolizine and Indolizine Alkaloids. , 1999, , 213-220.		7
98	Novel l-Tartaric Acid Derived Pyrrolidinium Cations for the Synthesis of Chiral Ionic Liquids. Synlett, 2009, 2009, 747-750.	1.8	6
99	Iminoâ€•and Azasugar Protonation Inside Human Acid Î²â€Glucosidase, the Enzyme that is Defective in Gaucher Disease. Angewandte Chemie, 2020, 132, 10552-10555.	2.0	6
100	N-Glycosylhydroxylamines as Masked Polyhydroxylated Chiral Nitrones in Cycloaddition Reactions: An Access to Pyrrolizidines. Heterocycles, 2009, 79, 883.	0.7	6
101	Synthesis of a Novel Tetrahydroxylated Î²-Homoproline. Synlett, 2011, 2011, 231-234.	1.8	4
102	Studies for the Multimerization of DABâ€1â€Based Iminosugars through Iteration of the Nitrone Cycloaddition/Ringâ€Opening/Allylation Sequence. European Journal of Organic Chemistry, 2019, 2019, 4897-4905.	2.4	3
103	Synthesis of â€œAll-Cisâ€•Trihydroxypiperidines from a Carbohydrate-Derived Ketone: Hints for the Design of New Î²-Gal and GCase Inhibitors. Molecules, 2020, 25, 4526.	3.8	3
104	Chapter 10. Trehalose mimetics as inhibitors of trehalose processing enzymes. Carbohydrate Chemistry, 2011, , 259-302.	0.3	3
105	Multivalent resorcinarene clusters decorated with DAB-1 inhitopes: targeting Golgi Î±-mannosidase from Drosophila melanogaster. Organic Chemistry Frontiers, 2021, 8, 6648-6656.	4.5	3
106	Synthesis of Azasugarâ€“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
107	Synthesis of a New Î²-Galactosidase Inhibitor Displaying Pharmacological Chaperone Properties for GM1 Gangliosidosis. Molecules, 2022, 27, 4008.	3.8	2
108	Synthesis of novel enantiopure ionic liquids from (S)-malic acid. Arkivoc, 2014, 2014, 54-64.	0.5	1

#	Article	IF	Citations
109	Indium-Mediated Reduction of Hydroxylamines to Amines.. ChemInform, 2003, 34, no.	0.0	0
110	Iterative Organometallic Addition to Chiral Hydroxylated Cyclic Nitrones: Highly Stereoselective Syntheses of Î±,Î±â€²- and Î±,Î±-Substituted Hydroxypyrrolidines.. ChemInform, 2004, 35, no.	0.0	0
111	Methyltrioxorhenium-Catalyzed Oxidation of Aromatic Aldoximes.. ChemInform, 2004, 35, no.	0.0	0
112	Women in Bioorganic Chemistry. Molecules, 2022, 27, 4290.	3.8	0