

# Franck Fieschi

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/7752930/publications.pdf>

Version: 2024-02-01

103  
papers

5,985  
citations

76326

40  
h-index

76900

74  
g-index

107  
all docs

107  
docs citations

107  
times ranked

7054  
citing authors

#	ARTICLE	IF	CITATIONS
1	Immunization with synthetic SARS-CoV-2 S glycoprotein virus-like particles protects macaques from infection. <i>Cell Reports Medicine</i> , 2022, 3, 100528.	6.5	6
2	Glycomimetic ligands block the interaction of SARS-CoV-2 spike protein with C-type lectin co-receptors. <i>Chemical Communications</i> , 2022, 58, 5136-5139.	4.1	7
3	Identification of a two-component regulatory system involved in antimicrobial peptide resistance in <i>Streptococcus pneumoniae</i> . <i>PLoS Pathogens</i> , 2022, 18, e1010458.	4.7	9
4	Targeting Tn-Antigen-Positive Human Tumors with a Recombinant Human Macrophage Galactose C-Type Lectin. <i>Molecular Pharmaceutics</i> , 2022, 19, 235-245.	4.6	15
5	Precision Glycodendrimers for DC-SIGN Targeting**. <i>European Journal of Organic Chemistry</i> , 2022, .	2.4	3
6	Clinical, functional and genetic characterization of 16 patients suffering from chronic granulomatous disease variants—Identification of 11 novel mutations in CYBB. <i>Clinical and Experimental Immunology</i> , 2021, 203, 247-266.	2.6	14
7	Lectin recognition and hepatocyte endocytosis of GalNAc-decorated nanostructured lipid carriers. <i>Journal of Drug Targeting</i> , 2021, 29, 99-107.	4.4	9
8	Controlled density glycodendron microarrays for studying carbohydrate-lectin interactions. <i>Organic and Biomolecular Chemistry</i> , 2021, 19, 7357-7362.	2.8	6
9	Synthesis, self-assembly and Langerin recognition studies of a resorcinarene-based glycocluster exposing a hyaluronic acid thiodisaccharide mimetic. <i>Organic and Biomolecular Chemistry</i> , 2021, 19, 6455-6467.	2.8	0
10	New lipophilic glycomimetic DC-SIGN ligands: Stereoselective synthesis and SPR-based binding inhibition assays. <i>Bioorganic Chemistry</i> , 2021, 107, 104566.	4.1	4
11	DC/L-SIGN recognition of spike glycoprotein promotes SARS-CoV-2 trans-infection and can be inhibited by a glycomimetic antagonist. <i>PLoS Pathogens</i> , 2021, 17, e1009576.	4.7	133
12	NADPH Oxidases (NOX): An Overview from Discovery, Molecular Mechanisms to Physiology and Pathology. <i>Antioxidants</i> , 2021, 10, 890.	5.1	239
13	Lipid bilayer degradation induced by SARS-CoV-2 spike protein as revealed by neutron reflectometry. <i>Scientific Reports</i> , 2021, 11, 14867.	3.3	21
14	Membrane-Bound Flavocytochrome MsrQ Is a Substrate of the Flavin Reductase Fre in <i>Escherichia coli</i> . <i>ACS Chemical Biology</i> , 2021, 16, 2547-2559.	3.4	3
15	Low-Valent Calix[4]arene Glycoconjugates Based on Hydroxamic Acid Bearing Linkers as Potent Inhibitors in a Model of Ebola Virus Cis-Infection and HCMV-gB-Recombinant Glycoprotein Interaction with MDDC Cells by Blocking DC-SIGN. <i>Journal of Medicinal Chemistry</i> , 2021, 64, 14332-14343.	6.4	5
16	Protein Mannosylation as a Diagnostic and Prognostic Biomarker of Lupus Nephritis: An Unusual Glycan Neopeptide in Systemic Lupus Erythematosus. <i>Arthritis and Rheumatology</i> , 2021, 73, 2069-2077.	5.6	15
17	SARS-CoV-2 spike protein removes lipids from model membranes and interferes with the capacity of high density lipoprotein to exchange lipids. <i>Journal of Colloid and Interface Science</i> , 2021, 602, 732-739.	9.4	18
18	Interdomain Flexibility within NADPH Oxidase Suggested by SANS Using LMNG Stealth Carrier. <i>Biophysical Journal</i> , 2020, 119, 605-618.	0.5	9

#	ARTICLE	IF	CITATIONS
19	Targeting of the C-Type Lectin Receptor Langerin Using Bifunctional Mannosylated Antigens. <i>Frontiers in Cell and Developmental Biology</i> , 2020, 8, 556.	3.7	13
20	Influence of the reducing-end anomeric configuration of the Man <sub>9</sub> epitope on DC-SIGN recognition. <i>Organic and Biomolecular Chemistry</i> , 2020, 18, 6086-6094.	2.8	6
21	TETRALEC, Artificial Tetrameric Lectins: A Tool to Screen Ligand and Pathogen Interactions. <i>International Journal of Molecular Sciences</i> , 2020, 21, 5290.	4.1	13
22	Chemo-Enzymatic Synthesis of <i>S. mansoni</i> Glycans and Their Evaluation as Ligands for C-Type Lectin Receptors MGL, DC-SIGN, and DC-SIGNR. <i>Chemistry - A European Journal</i> , 2020, 26, 12818-12830.	3.3	4
23	Second-Generation Dendrimers with Chondroitin Sulfate Type-E Disaccharides as Multivalent Ligands for Langerin. <i>Biomacromolecules</i> , 2020, 21, 2726-2734.	5.4	6
24	Development of C-type lectin-oriented surfaces for high avidity glycoconjugates: towards mimicking multivalent interactions on the cell surface. <i>Organic and Biomolecular Chemistry</i> , 2020, 18, 4763-4772.	2.8	26
25	Photoswitching mechanism of a fluorescent protein revealed by time-resolved crystallography and transient absorption spectroscopy. <i>Nature Communications</i> , 2020, 11, 741.	12.8	56
26	Rapid On-Chip Synthesis of Complex Glycomimetics from N-Glycan Scaffolds for Improved Lectin Targeting. <i>Chemistry - A European Journal</i> , 2020, 26, 12809-12817.	3.3	7
27	Enhancing Potency and Selectivity of a DC-SIGN Glycomimetic Ligand by Fragment-Based Design: Structural Basis. <i>Chemistry - A European Journal</i> , 2019, 25, 14659-14668.	3.3	25
28	Systematic Dual Targeting of Dendritic Cell C-Type Lectin Receptor DC-SIGN and TLR7 Using a Trifunctional Mannosylated Antigen. <i>Frontiers in Chemistry</i> , 2019, 7, 650.	3.6	37
29	Microbe-focused glycan array screening platform. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019, 116, 1958-1967.	7.1	71
30	Quantitative live-cell imaging and 3D modeling reveal critical functional features in the cytosolic complex of phagocyte NADPH oxidase. <i>Journal of Biological Chemistry</i> , 2019, 294, 3824-3836.	3.4	25
31	Unprecedented Thiocalixarene Fucoclusters as Strong Inhibitors of Ebola cis-Cell Infection and HCMV-gB Glycoprotein/DC-SIGN C-type Lectin Interaction. <i>Bioconjugate Chemistry</i> , 2019, 30, 1114-1126.	3.6	16
32	Human Macrophage Galactose-Type Lectin (MGL) Recognizes the Outer Core of <i>Escherichia coli</i> Lipooligosaccharide. <i>ChemBioChem</i> , 2019, 20, 1778-1782.	2.6	21
33	Assemblies of lauryl maltose neopentyl glycol (LMNG) and LMNG-solubilized membrane proteins. <i>Biochimica Et Biophysica Acta - Biomembranes</i> , 2019, 1861, 939-957.	2.6	23
34	Fine Mapping the Interaction Between Dendritic Cell-Specific Intercellular Adhesion Molecule (ICAM)-3-Grabbing Nonintegrin and the Cytomegalovirus Envelope Glycoprotein B. <i>Journal of Infectious Diseases</i> , 2018, 218, 490-503.	4.0	12
35	Rational-Differential Design of Highly Specific Glycomimetic Ligands: Targeting DC-SIGN and Excluding Langerin Recognition. <i>ACS Chemical Biology</i> , 2018, 13, 600-608.	3.4	56
36	New branched amino acids for high affinity dendrimeric DC-SIGN ligands. <i>Bioorganic and Medicinal Chemistry</i> , 2018, 26, 1006-1015.	3.0	9

#	ARTICLE	IF	CITATIONS
37	Chromophore twisting in the excited state of a photoswitchable fluorescent protein captured by time-resolved serial femtosecond crystallography. <i>Nature Chemistry</i> , 2018, 10, 31-37.	13.6	152
38	On-Chip Screening of a Glycomimetic Library with C-type Lectins Reveals Structural Features Responsible for Preferential Binding of Dectin-2 over DC-SIGN/R and Langerin. <i>Chemistry - A European Journal</i> , 2018, 24, 14448-14460.	3.3	16
39	Chemoenzymatic Synthesis of N-glycan Positional Isomers and Evidence for Branch Selective Binding by Monoclonal Antibodies and Human C-type Lectin Receptors. <i>ACS Chemical Biology</i> , 2018, 13, 2269-2279.	3.4	38
40	Polyvalent C-glycomimetics based on $\alpha$ -fucose or $\alpha$ -mannose as potent DC-SIGN antagonists. <i>Organic and Biomolecular Chemistry</i> , 2017, 15, 3995-4004.	2.8	23
41	Facile access to pseudo-thio-1,2-dimannoside, a new glycomimetic DC-SIGN antagonist. <i>Bioorganic and Medicinal Chemistry</i> , 2017, 25, 5142-5147.	3.0	12
42	A Two-component NADPH Oxidase (NOX)-like System in Bacteria Is Involved in the Electron Transfer Chain to the Methionine Sulfoxide Reductase MsrP. <i>Journal of Biological Chemistry</i> , 2017, 292, 2485-2494.	3.4	35
43	Down-regulation of NOX2 activity in phagocytes mediated by ATM-kinase dependent phosphorylation. <i>Free Radical Biology and Medicine</i> , 2017, 113, 1-15.	2.9	25
44	Mannosylcalix[n]arenes as multivalent ligands for DC-SIGN. <i>Carbohydrate Research</i> , 2017, 453-454, 36-43.	2.3	18
45	The NOX Family of Proteins Is Also Present in Bacteria. <i>MBio</i> , 2017, 8, .	4.1	45
46	Solution Behavior of Amphiphilic Glycodendrimers with a Rod-Like Core. <i>Macromolecular Bioscience</i> , 2016, 16, 896-905.	4.1	8
47	Nonhydrolyzable C-disaccharides, a new class of DC-SIGN ligands. <i>Carbohydrate Research</i> , 2016, 435, 7-18.	2.3	12
48	Stereoselective innovative synthesis and biological evaluation of new real carba analogues of minimal epitope $\text{Man}\alpha(1,2)\text{Man}$ as DC-SIGN inhibitors. <i>RSC Advances</i> , 2016, 6, 89578-89584.	3.6	16
49	Detection and quantitative analysis of two independent binding modes of a small ligand responsible for DC-SIGN clustering. <i>Organic and Biomolecular Chemistry</i> , 2016, 14, 335-344.	2.8	18
50	Designing nanomolar antagonists of DC-SIGN-mediated HIV infection: ligand presentation using molecular rods. <i>Chemical Communications</i> , 2015, 51, 3816-3819.	4.1	74
51	Alteration of the Langerin Oligomerization State Affects Birbeck Granule Formation. <i>Biophysical Journal</i> , 2015, 108, 666-677.	0.5	13
52	Langerin-Heparin Interaction: Two Binding Sites for Small and Large Ligands As Revealed by a Combination of NMR Spectroscopy and Cross-Linking Mapping Experiments. <i>Journal of the American Chemical Society</i> , 2015, 137, 4100-4110.	13.7	61
53	DC-SIGN as a Target for Drug Development Based on Carbohydrates. , 2015, , 379-394.		2
54	Identification of NOX2 regions for normal biosynthesis of cytochrome <i>b<sub>558</sub></i> in phagocytes highlighting essential residues for p22 <sup>phox</sup> binding. <i>Biochemical Journal</i> , 2014, 464, 425-437.	3.7	13

#	ARTICLE	IF	CITATIONS
55	A multivalent inhibitor of the DC-SIGN dependent uptake of HIV-1 and Dengue virus. <i>Biomaterials</i> , 2014, 35, 4175-4184.	11.4	105
56	Monovalent mannose-based DC-SIGN antagonists: Targeting the hydrophobic groove of the receptor. <i>European Journal of Medicinal Chemistry</i> , 2014, 75, 308-326.	5.5	29
57	Unique DC-SIGN Clustering Activity of a Small Glycomimetic: A Lesson for Ligand Design. <i>ACS Chemical Biology</i> , 2014, 9, 1377-1385.	3.4	47
58	Selective Targeting of Dendritic Cells-Specific Intercellular Adhesion Molecule-3a-Catching Nonintegrin (DC-SIGN) with Mannose-Based Glycomimetics: Synthesis and Interaction Studies of Bis(benzylamide) Derivatives of a Pseudomannobioside. <i>Chemistry - A European Journal</i> , 2013, 19, 4786-4797.	3.3	53
59	Multivalent glycoconjugates as anti-pathogenic agents. <i>Chemical Society Reviews</i> , 2013, 42, 4709-4727.	38.1	464
60	Structure of a Glycomimetic Ligand in the Carbohydrate Recognition Domain of C-type Lectin DC-SIGN. Structural Requirements for Selectivity and Ligand Design. <i>Journal of the American Chemical Society</i> , 2013, 135, 2518-2529.	13.7	75
61	Synthesis of a selective inhibitor of a fucose binding bacterial lectin from <i>Burkholderia ambifaria</i> . <i>Organic and Biomolecular Chemistry</i> , 2013, 11, 4086.	2.8	26
62	Synthesis and Characterization of Linker-Armed Fucose-Based Glycomimetics. <i>European Journal of Organic Chemistry</i> , 2013, 2013, 5303-5314.	2.4	18
63	A glycomimetic compound inhibits DC-SIGN-mediated HIV infection in cellular and cervical explant models. <i>Aids</i> , 2012, 26, 127-137.	2.2	58
64	Glycosaminoglycans Are Interactants of Langerin: Comparison with gp120 Highlights an Unexpected Calcium-Independent Binding Mode. <i>PLoS ONE</i> , 2012, 7, e50722.	2.5	42
65	Pseudosaccharide Functionalized Dendrimers as Potent Inhibitors of DC-SIGN Dependent Ebola Pseudotyped Viral Infection. <i>Bioconjugate Chemistry</i> , 2011, 22, 1354-1365.	3.6	82
66	Insights into molecular recognition of LewisX mimics by DC-SIGN using NMR and molecular modelling. <i>Organic and Biomolecular Chemistry</i> , 2011, 9, 7705.	2.8	21
67	Semen Clusterin Is a Novel DC-SIGN Ligand. <i>Journal of Immunology</i> , 2011, 187, 5299-5309.	0.8	65
68	Second generation of fucose-based DC-SIGN ligands : affinity improvement and specificity versus Langerin. <i>Organic and Biomolecular Chemistry</i> , 2011, 9, 5778.	2.8	60
69	NADPH oxidase (NOX) isoforms are inhibited by celastrol with a dual mode of action. <i>British Journal of Pharmacology</i> , 2011, 164, 507-520.	5.4	105
70	Investigating alternative acidic proteases for H/D exchange coupled to mass spectrometry: Plasmepsin 2 but not plasmepsin 4 is active under quenching conditions. <i>Journal of the American Society for Mass Spectrometry</i> , 2010, 21, 76-79.	2.8	29
71	p47 Molecular Activation for Assembly of the Neutrophil NADPH Oxidase Complex. <i>Journal of Biological Chemistry</i> , 2010, 285, 28980-28990.	3.4	41
72	Regulation of NADPH Oxidase Activity in Phagocytes. <i>Journal of Biological Chemistry</i> , 2010, 285, 33197-33208.	3.4	40

#	ARTICLE	IF	CITATIONS
73	Leukotriene BLT2 Receptor Monomers Activate the Gi2 GTP-binding Protein More Efficiently than Dimers. <i>Journal of Biological Chemistry</i> , 2010, 285, 6337-6347.	3.4	51
74	NADPH oxidase activator p67phox behaves in solution as a multidomain protein with semi-flexible linkers. <i>Journal of Structural Biology</i> , 2010, 169, 45-53.	2.8	278
75	Inhibition of DC-SIGN-Mediated HIV Infection by a Linear Trimannoside Mimic in a Tetravalent Presentation. <i>ACS Chemical Biology</i> , 2010, 5, 301-312.	3.4	115
76	DC-SIGN Neck Domain Is a pH-sensor Controlling Oligomerization. <i>Journal of Biological Chemistry</i> , 2009, 284, 21229-21240.	3.4	105
77	Conformational changes in p47 <sup>phox</sup> upon activation highlighted by mass spectrometry coupled to hydrogen/deuterium exchange and limited proteolysis. <i>FEBS Letters</i> , 2009, 583, 835-840.	2.8	22
78	Structural Studies of Langerin and Birbeck Granule: A Macromolecular Organization Model. <i>Biochemistry</i> , 2009, 48, 2684-2698.	2.5	64
79	Overproduction, purification and preliminary crystallographic analysis of the carbohydrate-recognition domain of human langerin. <i>Acta Crystallographica Section F: Structural Biology Communications</i> , 2008, 64, 115-118.	0.7	8
80	Synthesis of Novel DC-SIGN Ligands with an $\alpha$ -Fucosylamide Anchor. <i>ChemBioChem</i> , 2008, 9, 1921-1930.	2.6	58
81	Saturation Transfer Difference (STD) NMR Spectroscopy Characterization of Dual Binding Mode of a Mannose Disaccharide to DC-SIGN. <i>ChemBioChem</i> , 2008, 9, 2225-2227.	2.6	63
82	Docking, synthesis, and NMR studies of mannosyl trisaccharide ligands for DC-SIGN lectin. <i>Organic and Biomolecular Chemistry</i> , 2008, 6, 2743.	2.8	37
83	Leu505 of Nox2 is crucial for optimal p67phox-dependent activation of the flavocytochrome b558 during phagocytic NADPH oxidase assembly. <i>Journal of Leukocyte Biology</i> , 2007, 81, 238-249.	3.3	22
84	Mannose Glycoconjugates Functionalized at Positions 1 and 6. Binding Analysis to DC-SIGN Using Biosensors. <i>Bioconjugate Chemistry</i> , 2007, 18, 963-969.	3.6	21
85	1,2-Mannobioside Mimic: Synthesis, DC-SIGN Interaction by NMR and Docking, and Antiviral Activity. <i>ChemMedChem</i> , 2007, 2, 1030-1036.	3.2	73
86	Small-Angle X-ray Scattering Reveals an Extended Organization for the Autoinhibitory Resting State of the p47 <sup>phox</sup> Modular Protein. <i>Biochemistry</i> , 2006, 45, 7185-7193.	2.5	32
87	CopH from <i>Cupriavidus metallidurans</i> CH34. A Novel Periplasmic Copper-Binding Protein. <i>Biochemistry</i> , 2006, 45, 5557-5566.	2.5	25
88	Mannose hyperbranched dendritic polymers interact with clustered organization of DC-SIGN and inhibit gp120 binding. <i>FEBS Letters</i> , 2006, 580, 2402-2408.	2.8	103
89	Effects of p47 C Terminus Phosphorylations on Binding Interactions with p40 and p67. <i>Journal of Biological Chemistry</i> , 2005, 280, 13752-13761.	3.4	65
90	Dendritic cell-specific ICAM3-grabbing non-integrin is essential for the productive infection of human dendritic cells by mosquito cell-derived dengue viruses. <i>EMBO Reports</i> , 2003, 4, 723-728.	4.5	436

#	ARTICLE	IF	CITATIONS
91	DC-SIGN and L-SIGN Are High Affinity Binding Receptors for Hepatitis C Virus Glycoprotein E2. Journal of Biological Chemistry, 2003, 278, 20358-20366.	3.4	319
92	Human Cytomegalovirus Binding to DC-SIGN Is Required for Dendritic Cell Infection and Target Cell trans-Infection. Immunity, 2002, 17, 653-664.	14.3	329
93	Detection and characterization of merohedral twinning in two protein crystals: bacteriorhodopsin and p67phox. Acta Crystallographica Section D: Biological Crystallography, 2002, 58, 784-791.	2.5	7
94	Small Angle Neutron Scattering and Gel Filtration Analyses of Neutrophil NADPH Oxidase Cytosolic Factors Highlight the Role of the C-Terminal End of p47 <sup>p</sup> in the Association with p40 <sup>phox</sup> . Biochemistry, 2001, 40, 3127-3133.	2.5	25
95	Crystal Structure of the Rac1~RhoGDI Complex Involved in NADPH Oxidase Activation. Biochemistry, 2001, 40, 10007-10013.	2.5	127
96	The Active N-terminal Region of p67. Journal of Biological Chemistry, 2001, 276, 21627-21631.	3.4	79
97	The Active Form of the R2F Protein of Class Ib Ribonucleotide Reductase from Corynebacterium ammoniagenes Is a Diferric Protein. Journal of Biological Chemistry, 2000, 275, 25365-25371.	3.4	58
98	The NAD(P)H:Flavin Oxidoreductase from Escherichia coli. Journal of Biological Chemistry, 1999, 274, 18252-18260.	3.4	38
99	The Manganese-containing Ribonucleotide Reductase of Corynebacterium ammoniagenes Is a Class Ib Enzyme. Journal of Biological Chemistry, 1998, 273, 4329-4337.	3.4	54
100	Is the NAD(P)H:Flavin Oxidoreductase from a Member of the Ferredoxin-NADP+ Reductase Family?. Journal of Biological Chemistry, 1996, 271, 16656-16661.	3.4	32
101	Cys5 and Cys214 of NAD(P)H:Flavin Oxidoreductase from Escherichia coli are Located in the Active Site. FEBS Journal, 1996, 237, 870-875.	0.2	6
102	The Mechanism and Substrate Specificity of the NADPH:Flavin Oxidoreductase from Escherichia coli. Journal of Biological Chemistry, 1995, 270, 30392-30400.	3.4	109
103	Inactivation of ribonucleotide reductase by nitric oxide. Biochemical and Biophysical Research Communications, 1991, 179, 442-448.	2.1	322