

# Stephen Goldup

## List of Publications by Year in descending order

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83

papers

6,817

citations

53794

45

h-index

58581

82

g-index

105

all docs

105

docs citations

105

times ranked

4568

citing authors

#	ARTICLE	IF	CITATIONS
1	Sequence-Specific Peptide Synthesis by an Artificial Small-Molecule Machine. <i>Science</i> , 2013, 339, 189-193.	12.6	659
2	Active metal template synthesis of rotaxanes, catenanes and molecular shuttles. <i>Chemical Society Reviews</i> , 2009, 38, 1530.	38.1	573
3	An autonomous chemically fuelled small-molecule motor. <i>Nature</i> , 2016, 534, 235-240.	27.8	370
4	Catalytic "Active-Metal" Template Synthesis of [2]Rotaxanes, [3]Rotaxanes, and Molecular Shuttles, and Some Observations on the Mechanism of the Cu(I)-Catalyzed Azide-Alkyne 1,3-Cycloaddition. <i>Journal of the American Chemical Society</i> , 2007, 129, 11950-11963.	13.7	248
5	Chemical consequences of mechanical bonding in catenanes and rotaxanes: isomerism, modification, catalysis and molecular machines for synthesis. <i>Chemical Communications</i> , 2014, 50, 5128-5142.	4.1	237
6	Chirality in rotaxanes and catenanes. <i>Chemical Society Reviews</i> , 2018, 47, 5266-5311.	38.1	222
7	The active template approach to interlocked molecules. <i>Nature Reviews Chemistry</i> , 2017, 1, .	30.2	203
8	Terahertz spectroscopy: a powerful new tool for the chemical sciences?. <i>Chemical Society Reviews</i> , 2012, 41, 2072-2082.	38.1	192
9	A Chemically-Driven Molecular Information Ratchet. <i>Journal of the American Chemical Society</i> , 2008, 130, 1836-1838.	13.7	187
10	Metal ions in the synthesis of interlocked molecules and materials. <i>Chemical Society Reviews</i> , 2017, 46, 2577-2591.	38.1	182
11	Properties and emerging applications of mechanically interlocked ligands. <i>Chemical Communications</i> , 2017, 53, 298-312.	4.1	155
12	An Efficient Approach to Mechanically Planar Chiral Rotaxanes. <i>Journal of the American Chemical Society</i> , 2014, 136, 4817-4820.	13.7	142
13	A Stimuli-Responsive Rotaxane "Gold Catalyst": Regulation of Activity and Diastereoselectivity. <i>Angewandte Chemie - International Edition</i> , 2015, 54, 13545-13549.	13.8	140
14	Active-Metal Template Synthesis of a Molecular Trefoil Knot. <i>Angewandte Chemie - International Edition</i> , 2011, 50, 12280-12284.	13.8	137
15	Macrocyclic Size Matters: Small Functionalized Rotaxanes in Excellent Yield Using the CuAAC Active Template Approach. <i>Angewandte Chemie - International Edition</i> , 2011, 50, 4151-4155.	13.8	130
16	Active Metal Template Synthesis of [2]Catenanes. <i>Journal of the American Chemical Society</i> , 2009, 131, 15924-15929.	13.7	127
17	Simplicity in the Design, Operation, and Applications of Mechanically Interlocked Molecular Machines. <i>ACS Central Science</i> , 2020, 6, 117-128.	11.3	122
18	An Unusual Nickel-Copper-Mediated Alkyne Homocoupling Reaction for the Active-Template Synthesis of [2]Rotaxanes. <i>Journal of the American Chemical Society</i> , 2010, 132, 6243-6248.	13.7	121

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19	A Three-Compartment Chemically-Driven Molecular Information Ratchet. <i>Journal of the American Chemical Society</i> , 2012, 134, 8321-8323.	13.7	115
20	Synthesis of a Mechanically Planar Chiral Rotaxane Ligand for Enantioselective Catalysis. <i>CheM</i> , 2020, 6, 994-1006.	11.7	114
21	Ligand-assisted nickel-catalysed sp <sub>3</sub> -sp <sub>3</sub> homocoupling of unactivated alkyl bromides and its application to the active template synthesis of rotaxanes. <i>Chemical Science</i> , 2010, 1, 383.	7.4	104
22	Cadiot-Chodkiewicz Active Template Synthesis of Rotaxanes and Switchable Molecular Shuttles with Weak Intercomponent Interactions. <i>Angewandte Chemie - International Edition</i> , 2008, 47, 4392-4396.	13.8	101
23	A Catalytic Palladium Active-Metal Template Pathway to [2]Rotaxanes. <i>Angewandte Chemie - International Edition</i> , 2007, 46, 5709-5713.	13.8	100
24	Synthesis of a Rotaxane Cu <sup>I</sup> Triazolide under Aqueous Conditions. <i>Journal of the American Chemical Society</i> , 2013, 135, 13318-13321.	13.7	97
25	Iterative Synthesis of Oligo[n]rotaxanes in Excellent Yield. <i>Journal of the American Chemical Society</i> , 2016, 138, 16329-16336.	13.7	92
26	Gold(I)-Template Catenane and Rotaxane Synthesis. <i>Angewandte Chemie - International Edition</i> , 2008, 47, 6999-7003.	13.8	83
27	Modular click™ sensors for zinc and their application in vivo. <i>Chemical Communications</i> , 2011, 47, 6036.	4.1	82
28	Two Axles Threaded Using a Single Template Site: Active Metal Template Macrocyclic [3]Rotaxanes. <i>Journal of the American Chemical Society</i> , 2010, 132, 315-320.	13.7	80
29	Chelating Rotaxane Ligands as Fluorescent Sensors for Metal Ions. <i>Angewandte Chemie - International Edition</i> , 2018, 57, 5310-5314.	13.8	79
30	High yielding synthesis of 2,2'-bipyridine macrocycles, versatile intermediates in the synthesis of rotaxanes. <i>Chemical Science</i> , 2016, 7, 3154-3161.	7.4	74
31	Stereoselective Synthesis of Mechanically Planar Chiral Rotaxanes. <i>Angewandte Chemie - International Edition</i> , 2018, 57, 14806-14810.	13.8	68
32	Photodegradation of Rhodamine B over Ag modified ferroelectric BaTiO <sub>3</sub> under simulated solar light: pathways and mechanism. <i>RSC Advances</i> , 2015, 5, 30372-30379.	3.6	67
33	Active Template Synthesis of Rotaxanes and Molecular Shuttles with Switchable Dynamics by Four-Component Pd <sup>II</sup> -Promoted Michael Additions. <i>Angewandte Chemie - International Edition</i> , 2008, 47, 3381-3384.	13.8	64
34	A Fluorescent Ditopic Rotaxane Ion-Pair Host. <i>Angewandte Chemie - International Edition</i> , 2018, 57, 5315-5319.	13.8	62
35	Strategies for the Synthesis of Enantiopure Mechanically Chiral Molecules. <i>CheM</i> , 2020, 6, 1914-1932.	11.7	62
36	Two Flavors of PEPPSI-IPr: Activation and Diffusion Control in a Single NHC-Ligated Pd Catalyst?. <i>Organic Letters</i> , 2011, 13, 146-149.	4.6	60

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37	A Simple, Short, and Flexible Synthesis of Viridiofungin Derivatives. <i>Journal of Organic Chemistry</i> , 2006, 71, 6185-6191.	3.2	58
38	An Auxiliary Approach for the Stereoselective Synthesis of Topologically Chiral Catenanes. <i>Chem</i> , 2019, 5, 1512-1520.	11.7	57
39	Controlling catalyst activity, chemoselectivity and stereoselectivity with the mechanical bond. <i>Nature Reviews Chemistry</i> , 2022, 6, 182-196.	30.2	57
40	Rotaxane-Based Transition Metal Complexes: Effect of the Mechanical Bond on Structure and Electronic Properties. <i>Journal of the American Chemical Society</i> , 2019, 141, 879-889.	13.7	56
41	Competitive formation of homocircuit [3]rotaxanes in synthetically useful yields in the bipyridine-mediated active template CuAAC reaction. <i>Chemical Science</i> , 2015, 6, 2398-2404.	7.4	52
42	Efficient Multicomponent Active Template Synthesis of Catenanes. <i>Journal of the American Chemical Society</i> , 2018, 140, 4787-4791.	13.7	52
43	A Kinetic Selfâ€Sorting Approach to Heterocircuit [3]Rotaxanes. <i>Angewandte Chemie - International Edition</i> , 2016, 55, 12488-12493.	13.8	51
44	Biologically targeted probes for Zn <sup>2+</sup> : a diversity oriented modular â€œclick-S <sub>N</sub> Ar-clickâ€ approach. <i>Chemical Science</i> , 2014, 5, 3528-3535.	7.4	49
45	Crystallization of amorphous lactose at high humidity studied by terahertz time domain spectroscopy. <i>Chemical Physics Letters</i> , 2013, 558, 104-108.	2.6	41
46	A chiral interlocking auxiliary strategy for the synthesis of mechanically planar chiral rotaxanes. <i>Nature Chemistry</i> , 2022, 14, 179-187.	13.6	35
47	Chemical Consequences of the Mechanical Bond: A Tandem Active Templateâ€Rearrangement Reaction. <i>Angewandte Chemie - International Edition</i> , 2019, 58, 3875-3879.	13.8	32
48	Using the Mechanical Bond to Tune the Performance of a Thermally Activated Delayed Fluorescence Emitter**. <i>Angewandte Chemie - International Edition</i> , 2021, 60, 12066-12073.	13.8	32
49	AT-CuAAC Synthesis of Mechanically Interlocked Oligonucleotides. <i>Journal of the American Chemical Society</i> , 2020, 142, 5985-5990.	13.7	31
50	Unusual Mechanistic Course of Some NHC-Mediated Transesterifications. <i>Organic Letters</i> , 2009, 11, 1643-1646.	4.6	28
51	Porphyrinoid rotaxanes: building a mechanical picket fence. <i>Chemical Science</i> , 2017, 8, 6679-6685.	7.4	26
52	A Fluorescent Ditopic Rotaxane Ionâ€Pair Host. <i>Angewandte Chemie</i> , 2018, 130, 5413-5417.	2.0	26
53	Engaging Copper(III) Corrole as an Electron Acceptor: Photoinduced Charge Separation in Zinc Porphyrinâ€Copper Corrole Donorâ€Acceptor Conjugates. <i>Chemistry - A European Journal</i> , 2016, 22, 1301-1312.	3.3	25
54	Mechanically axially chiral catenanes and noncanonical mechanically axially chiral rotaxanes. <i>Nature Chemistry</i> , 2022, 14, 1038-1044.	13.6	25

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55	Selective and general exhaustive cross-coupling of di-chloroarenes with a deficit of nucleophiles mediated by a Pd-NHC complex. <i>Chemical Communications</i> , 2015, 51, 3832-3834.	4.1	22
56	Rotaxane PtII-complexes: mechanical bonding for chemically robust luminophores and stimuli responsive behaviour. <i>Chemical Science</i> , 2020, 11, 1839-1847.	7.4	22
57	Scalable anti-Markovnikov hydrobromination of aliphatic and aromatic olefins. <i>Organic and Biomolecular Chemistry</i> , 2016, 14, 5622-5626.	2.8	21
58	A Co-conformationally “Topologically” Chiral Catenane. <i>Journal of the American Chemical Society</i> , 2022, 144, 11927-11932.	13.7	21
59	Anion-“Catalysis Enabled by the Mechanical Bond**. <i>Angewandte Chemie - International Edition</i> , 2022, 61, .	13.8	20
60	Vibrational circular dichroism spectroscopy for probing the expression of chirality in mechanically planar chiral rotaxanes. <i>Chemical Science</i> , 2020, 11, 8469-8475.	7.4	19
61	Rotaxane Co <sup>II</sup> Complexes as Field-Induced Single-Ion Magnets. <i>Angewandte Chemie - International Edition</i> , 2021, 60, 16051-16058.	13.8	19
62	Chelating Rotaxane Ligands as Fluorescent Sensors for Metal Ions. <i>Angewandte Chemie</i> , 2018, 130, 5408-5412.	2.0	18
63	A Kinetic Self-Sorting Approach to Heterocircuit [3]Rotaxanes. <i>Angewandte Chemie</i> , 2016, 128, 12676-12681.	2.0	15
64	Stepwise, Protecting Group Free Synthesis of [4]Rotaxanes. <i>Molecules</i> , 2017, 22, 89.	3.8	13
65	Synthesis and Characterisation of a Paramagnetic [2]Rotaxane Based on a Crown Ether-Like Wheel Incorporating a Nitroxide Motif. <i>Chemistry - A European Journal</i> , 2018, 24, 1198-1203.	3.3	12
66	Chemical Consequences of the Mechanical Bond: A Tandem Active Template-Rearrangement Reaction. <i>Angewandte Chemie</i> , 2019, 131, 3915-3919.	2.0	12
67	A chiral catalyst with a ring to it. <i>Nature Chemistry</i> , 2016, 8, 404-406.	13.6	11
68	Two steps uphill. <i>Nature Nanotechnology</i> , 2015, 10, 488-489.	31.5	10
69	A [3]Rotaxane Host Selects Between Stereoisomers. <i>Angewandte Chemie - International Edition</i> , 2018, 57, 4462-4464.	13.8	10
70	Stereoselective Synthesis of Mechanically Planar Chiral Rotaxanes. <i>Angewandte Chemie</i> , 2018, 130, 15022-15026.	2.0	10
71	Chirality makes a move. <i>Nature Chemistry</i> , 2019, 11, 765-767.	13.6	9
72	Synthesis, photophysical and assembly studies of novel luminescent lanthanide(III) complexes of 1,2,3-triazolyl-pyridine-2,6-dicarboxamide-based ligands. <i>Supramolecular Chemistry</i> , 2021, 33, 160-173.	1.2	6

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73	Molecular machines swap rings. <i>Nature</i> , 2018, 557, 39-40.	27.8	5
74	Spin-labelled mechanically interlocked molecules as models for the interpretation of biradical EPR spectra. <i>Chemical Science</i> , 2021, 12, 8385-8393.	7.4	4
75	Using the Mechanical Bond to Tune the Performance of a Thermally Activated Delayed Fluorescence Emitter**. <i>Angewandte Chemie</i> , 2021, 133, 12173-12180.	2.0	4
76	Damming an electronic energy reservoir: ion-regulated electronic energy shuttling in a [2]rotaxane. <i>Chemical Science</i> , 2021, 12, 9196-9200.	7.4	3
77	Rotaxane Co II Complexes as Field-Induced Single-Ion Magnets. <i>Angewandte Chemie</i> , 2021, 133, 16187-161942.o	2	
78	Rotaxanation as a sequestering template to preclude incidental metal insertion in complex oligochromophores. <i>Chemical Communications</i> , 2020, 56, 7447-7450.	4.1	1
79	Back Cover: Active-Metal Template Synthesis of a Molecular Trefoil Knot ( <i>Angew. Chem. Int. Ed.</i> 51/2011). <i>Angewandte Chemie - International Edition</i> , 2011, 50, 12366-12366.	13.8	0
80	Investigation of n-octadecane's crystallization by quasi-optical transmissometer. , 2012, , .		0
81	Profile: Early excellence in <i>Physical Organic Chemistry</i>. <i>Journal of Physical Organic Chemistry</i> , 2016, 29, 324-325.	1.9	0
82	Ein [3]Rotaxan-Wirt selektiert zwischen Stereoisomeren. <i>Angewandte Chemie</i> , 2018, 130, 4550-4552.	2.0	0
83	Anion-Catalysis Enabled by the Mechanical Bond**. <i>Angewandte Chemie</i> , 0, , .	2.0	0