Steffen J Sahl

List of Publications by Year
in descending order

35 papers	3,578 citations	236925 25 h-index	377865 34 g-index
38 all docs	38 docs citations	38 times ranked	4692 citing authors

#	Article	IF	Citations
1	Optimal precision and accuracy in 4Pi-STORM using dynamic spline PSF models. Nature Methods, 2022, 19, 603-612.	19.0	21
2	Enhanced incorporation of subnanometer tags into cellular proteins for fluorescence nanoscopy via optimized genetic code expansion. Proceedings of the National Academy of Sciences of the United States of America, 2022, 119, .	7.1	14
3	MINFLUX nanometer-scale 3D imaging and microsecond-range tracking on a common fluorescence microscope. Nature Communications, 2021, 12, 1478.	12.8	125
4	High-Resolution 3D Light Microscopy with STED and RESOLFT. , 2019, , 3-32.		14
5	Autonomous bioluminescence imaging of single mammalian cells with the bacterial bioluminescence system. Proceedings of the National Academy of Sciences of the United States of America, 2019, 116, 26491-26496.	7.1	43
6	Superresolution Fluorescence Imaging of Mutant Huntingtin Aggregation in Cells. Methods in Molecular Biology, 2019, 1873, 241-251.	0.9	3
7	Fluorescence Microscopy with Nanometer Resolution. Springer Handbooks, 2019, , 1089-1143.	0.6	5
8	Novel reversibly switchable fluorescent proteins for RESOLFT and STED nanoscopy engineered from the bacterial photoreceptor YtvA. Scientific Reports, 2018, 8, 2724.	3.3	21
9	Strongly enhanced bacterial bioluminescence with the lux operon for single-cell imaging. Proceedings of the National Academy of Sciences of the United States of America, 2018, 115, 962-967.	7.1	96
10	A Proximity Labeling Strategy Provides Insights into the Composition and Dynamics of Lipid Droplet Proteomes. Developmental Cell, 2018, 44, 97-112.e7.	7.0	240
11	Robust nanoscopy of a synaptic protein in living mice by organic-fluorophore labeling. Proceedings of the National Academy of Sciences of the United States of America, 2018, 115, E8047-E8056.	7.1	85
12	Ground State Depletion Nanoscopy Resolves Semiconductor Nanowire Barcode Segments at Room Temperature. Nano Letters, 2017, 17, 2652-2659.	9.1	20
13	Strong signal increase in STED fluorescence microscopy by imaging regions of subdiffraction extent. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 2125-2130.	7.1	93
14	Multicolour nanoscopy of fixed and living cells with a single STED beam and hyperspectral detection. Scientific Reports, 2017, 7, 46492.	3.3	50
15	Achromatic light patterning and improved image reconstruction for parallelized RESOLFT nanoscopy. Scientific Reports, 2017, 7, 44619.	3.3	25
16	Adaptive-illumination STED nanoscopy. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 9797-9802.	7.1	128
17	SRpHi ratiometric pH biosensors for super-resolution microscopy. Nature Communications, 2017, 8, 577.	12.8	50
18	Photobleaching in STED nanoscopy and its dependence on the photon flux applied for reversible silencing of the fluorophore. Scientific Reports, 2017, 7, 11354.	3.3	47

#	Article	IF	Citations
19	Fluorescence nanoscopy in cell biology. Nature Reviews Molecular Cell Biology, 2017, 18, 685-701.	37.0	773
20	Comment on â€œExtended-resolution structured illumination imaging of endocytic and cytoskeletal dynamicsâ€. Science, 2016, 352, 527-527.	12.6	43
21	Delayed emergence of subdiffraction-sized mutant huntingtin fibrils following inclusion body formation. Quarterly Reviews of Biophysics, 2016, 49, e2.	5.7	39
22	Breaking the diffraction limit of light-sheet fluorescence microscopy by RESOLFT. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, 3442-3446.	7.1	72
23	STED nanoscopy with fluorescent quantum dots. Nature Communications, 2015, 6, 7127.	12.8	171
24	Ultrafast, temporally stochastic STED nanoscopy of millisecond dynamics. Nature Methods, 2015, 12, 827-830.	19.0	104
25	Lens-based fluorescence nanoscopy. Quarterly Reviews of Biophysics, 2015, 48, 178-243.	5.7	126
26	Single-molecule imaging of Hedgehog pathway protein Smoothened in primary cilia reveals binding events regulated by Patched1. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 8320-8325.	7.1	89
27	Precise Three-Dimensional Scan-Free Multiple-Particle Tracking over Large Axial Ranges with Tetrapod Point Spread Functions. Nano Letters, 2015, 15, 4194-4199.	9.1	210
28	A bisected pupil for studying single-molecule orientational dynamics and its application to three-dimensional super-resolution microscopy. Applied Physics Letters, 2014, 104, 193701.	3.3	68
29	Highâ€Resolution Tracking of Singleâ€Molecule Diffusion in Membranes by Confocalized and Spatially Differentiated Fluorescence Photon Stream Recording. ChemPhysChem, 2014, 15, 771-783.	2.1	16
30	Optimal Point Spread Function Design for 3D Imaging. Physical Review Letters, 2014, 113, 133902.	7.8	277
31	Super-resolution fluorescence imaging with single molecules. Current Opinion in Structural Biology, 2013, 23, 778-787.	5.7	127
32	The double-helix point spread function enables precise and accurate measurement of 3D single-molecule localization and orientation. Proceedings of SPIE, 2013, 8590, 85900.	0.8	25
33	Cellular Inclusion Bodies of Mutant Huntingtin Exon 1 Obscure Small Fibrillar Aggregate Species. Scientific Reports, 2012, 2, 895.	3.3	74
34	STED Microscopy with Optimized Labeling Density Reveals 9-Fold Arrangement of a Centriole Protein. Biophysical Journal, 2012, 102, 2926-2935.	0.5	106
35	Fast molecular tracking maps nanoscale dynamics of plasma membrane lipids. Proceedings of the National Academy of Sciences of the United States of America, 2010, 107, 6829-6834.	7.1	174