Oleksandr Yefanov

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/1761330/publications.pdf

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52 papers 4,018 citations

28 h-index 52 g-index

57 all docs

57 docs citations

57 times ranked

4103 citing authors

#	Article	IF	CITATIONS
1	Crystal structure of rhodopsin bound to arrestin by femtosecond X-ray laser. Nature, 2015, 523, 561-567.	27.8	683
2	Time-resolved serial crystallography captures high-resolution intermediates of photoactive yellow protein. Science, 2014, 346, 1242-1246.	12.6	418
3	Femtosecond structural dynamics drives the trans/cis isomerization in photoactive yellow protein. Science, 2016, 352, 725-729.	12.6	348
4	Recent developments in <i>CrystFEL</i> . Journal of Applied Crystallography, 2016, 49, 680-689.	4.5	222
5	Room-temperature macromolecular serial crystallography using synchrotron radiation. IUCrJ, 2014, 1, 204-212.	2.2	221
6	Serial crystallography on <i>in vivo </i> grown microcrystals using synchrotron radiation. IUCrJ, 2014, 1, 87-94.	2.2	204
7	Megahertz serial crystallography. Nature Communications, 2018, 9, 4025.	12.8	147
8	Enzyme intermediates captured "on the fly―by mix-and-inject serial crystallography. BMC Biology, 2018, 16, 59.	3.8	117
9	X-ray focusing with efficient high-NA multilayer Laue lenses. Light: Science and Applications, 2018, 7, 17162-17162.	16.6	114
10	Time-resolved serial femtosecond crystallography at the European XFEL. Nature Methods, 2020, 17, 73-78.	19.0	110
11	Ultracompact 3D microfluidics for time-resolved structural biology. Nature Communications, 2020, 11, 657.	12.8	106
12	Mix-and-diffuse serial synchrotron crystallography. IUCrJ, 2017, 4, 769-777.	2.2	98
13	Structural enzymology using X-ray free electron lasers. Structural Dynamics, 2017, 4, 044003.	2.3	92
14	Double-flow focused liquid injector for efficient serial femtosecond crystallography. Scientific Reports, 2017, 7, 44628.	3.3	90
15	High numerical aperture multilayer Laue lenses. Scientific Reports, 2015, 5, 9892.	3.3	89
16	<i>XGANDALF</i> – extended gradient descent algorithm for lattice finding. Acta Crystallographica Section A: Foundations and Advances, 2019, 75, 694-704.	0.1	80
17	Accurate determination of segmented X-ray detector geometry. Optics Express, 2015, 23, 28459.	3.4	69
18	Serial protein crystallography in an electron microscope. Nature Communications, 2020, 11, 996.	12.8	69

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19	Atomic structure of granulin determined from native nanocrystalline granulovirus using an X-ray free-electron laser. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 2247-2252.	7.1	65
20	Rapid sample delivery for megahertz serial crystallography at X-ray FELs. IUCrJ, 2018, 5, 574-584.	2.2	52
21	X-ray laser diffraction for structure determination of the rhodopsin-arrestin complex. Scientific Data, 2016, 3, 160021.	5.3	51
22	3D diffractive imaging of nanoparticle ensembles using an x-ray laser. Optica, 2021, 8, 15.	9.3	48
23	Ultrafast structural changes within a photosynthetic reaction centre. Nature, 2021, 589, 310-314.	27.8	47
24	Observation of substrate diffusion and ligand binding in enzyme crystals using high-repetition-rate mix-and-inject serial crystallography. IUCrJ, 2021, 8, 878-895.	2.2	44
25	On-chip crystallization for serial crystallography experiments and on-chip ligand-binding studies. IUCrJ, 2019, 6, 714-728.	2.2	41
26	1 kHz fixed-target serial crystallography using a multilayer monochromator and an integrating pixel detector. IUCrJ, 2019, 6, 927-937.	2.2	35
27	Ternary structure reveals mechanism of a membrane diacylglycerol kinase. Nature Communications, 2015, 6, 10140.	12.8	30
28	Mapping the continuous reciprocal space intensity distribution of X-ray serial crystallography. Philosophical Transactions of the Royal Society B: Biological Sciences, 2014, 369, 20130333.	4.0	29
29	Perspectives for imaging single protein molecules with the present design of the European XFEL. Structural Dynamics, 2015, 2, 041702.	2.3	29
30	<i>>pinkIndexer</i> – a universal indexer for pink-beam X-ray and electron diffraction snapshots. Acta Crystallographica Section A: Foundations and Advances, 2020, 76, 121-131.	0.1	28
31	Structural Evolution of Colloidal Crystal Films in the Process of Melting Revealed by Bragg Peak Analysis. Langmuir, 2015, 31, 5274-5283.	3.5	27
32	FELIX: an algorithm for indexing multiple crystallites in X-ray free-electron laser snapshot diffraction images. Journal of Applied Crystallography, 2017, 50, 1075-1083.	4.5	27
33	Evaluation of serial crystallographic structure determination within megahertz pulse trains. Structural Dynamics, 2019, 6, 064702.	2.3	26
34	From Macrocrystals to Microcrystals: A Strategy for Membrane Protein Serial Crystallography. Structure, 2017, 25, 1461-1468.e2.	3.3	21
35	Femtosecond X-ray diffraction from an aerosolized beam of protein nanocrystals. Journal of Applied Crystallography, 2018, 51, 133-139.	4.5	18
36	Synchronous RNA conformational changes trigger ordered phase transitions in crystals. Nature Communications, 2021, 12, 1762.	12.8	17

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37	Analysis of XFEL serial diffraction data from individual crystalline fibrils. IUCrJ, 2017, 4, 795-811.	2.2	16
38	Pink-beam serial femtosecond crystallography for accurate structure-factor determination at an X-ray free-electron laser. IUCrJ, 2021, 8, 905-920.	2.2	11
39	Ptychographic X-ray speckle tracking with multi-layer Laue lens systems. Journal of Applied Crystallography, 2020, 53, 927-936.	4.5	11
40	Data reduction for serial crystallography using a robust peak finder. Journal of Applied Crystallography, 2021, 54, 1360-1378.	4.5	10
41	Unsupervised learning approaches to characterizing heterogeneous samples using X-ray single-particle imaging. IUCrJ, 2022, 9, 204-214.	2.2	9
42	Post-sample aperture for low background diffraction experiments at X-ray free-electron lasers. Journal of Synchrotron Radiation, 2017, 24, 1296-1298.	2.4	8
43	<i>XVis</i> : an educational open-source program for demonstration of reciprocal-space construction and diffraction principles. Journal of Applied Crystallography, 2008, 41, 647-652.	4.5	6
44	Accessible reciprocal-space region for non-coplanar Bragg and Laue geometries. Journal of Applied Crystallography, 2008, 41, 110-114.	4.5	5
45	Determination of the Exact Orientation of Single-Crystal X-ray Optics from Its Glitch Spectrum and Modeling of Glitches for an Arbitrary Configuration. Crystals, 2021, 11, 504.	2.2	5
46	Probing Dynamics in Colloidal Crystals with Pump-Probe Experiments at LCLS: Methodology and Analysis. Applied Sciences (Switzerland), 2017, 7, 519.	2.5	4
47	Predicting glitches of intensity in single-crystal diamond CRLs. AIP Conference Proceedings, 2020, , .	0.4	4
48	Suppressing Diffraction-Related Intensity Losses in Transmissive Single-Crystal X-ray Optics. Crystals, 2021, 11, 1561.	2.2	3
49	Atomic structure of granulin determined from native nanocrystalline granulovirus using an X-ray free-electron laser. Acta Crystallographica Section A: Foundations and Advances, 2017, 73, a292-a293.	0.1	2
50	Using diffraction losses of X-rays in a single crystal for determination of its lattice parameters as well as for monochromator calibration. Journal of Synchrotron Radiation, 2022, 29, 369-376.	2.4	2
51	Trace phase detection and strain characterization from serial X-ray free-electron laser crystallography of a $Pr(sub)0.5$	0.2	1
52	Robust ptychographic X-ray speckle tracking with multilayer Laue lenses. Optics Express, 2022, 30, 25450.	3.4	1