

# Pengming Song

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/12129762/publications.pdf>

Version: 2024-02-01

26  
papers

780  
citations

623734

14  
h-index

552781

26  
g-index

26  
all docs

26  
docs citations

26  
times ranked

317  
citing authors

#	ARTICLE	IF	CITATIONS
1	Concept, implementations and applications of Fourier ptychography. Nature Reviews Physics, 2021, 3, 207-223.	26.6	180
2	Wide-field, high-resolution lensless on-chip microscopy <i>via</i> near-field blind ptychographic modulation. Lab on A Chip, 2020, 20, 1058-1065.	6.0	80
3	Autofocusing technologies for whole slide imaging and automated microscopy. Journal of Biophotonics, 2020, 13, e202000227.	2.3	60
4	OpenWSI: a low-cost, high-throughput whole slide imaging system via single-frame autofocusing and open-source hardware. Optics Letters, 2020, 45, 260.	3.3	45
5	Super-resolution microscopy via ptychographic structured modulation of a diffuser. Optics Letters, 2019, 44, 3645.	3.3	42
6	Field-portable quantitative lensless microscopy based on translated speckle illumination and sub-sampled ptychographic phase retrieval. Optics Letters, 2019, 44, 1976.	3.3	40
7	Resolution-Enhanced Parallel Coded Ptychography for High-Throughput Optical Imaging. ACS Photonics, 2021, 8, 3261-3271.	6.6	36
8	Full-field Fourier ptychography (FFP): Spatially varying pupil modeling and its application for rapid field-dependent aberration metrology. APL Photonics, 2019, 4, .	5.7	32
9	Fourier ptychographic microscopy using a generalized Anscombe transform approximation of the mixed Poisson-Gaussian likelihood. Optics Express, 2017, 25, 168.	3.4	31
10	Super-resolved multispectral lensless microscopy via angle-tilted, wavelength-multiplexed ptychographic modulation. Optics Letters, 2020, 45, 3486.	3.3	28
11	Virtual brightfield and fluorescence staining for Fourier ptychography via unsupervised deep learning. Optics Letters, 2020, 45, 5405.	3.3	22
12	Ptychographic modulation engine: a low-cost DIY microscope add-on for coherent super-resolution imaging. Journal Physics D: Applied Physics, 2020, 53, 014005.	2.8	21
13	Blood-Coated Sensor for High-Throughput Ptychographic Cytometry on a Blu-ray Disc. ACS Sensors, 2022, 7, 1058-1067.	7.8	19
14	High-throughput digital pathology <i>via</i> a handheld, multiplexed, and AI-powered ptychographic whole slide scanner. Lab on A Chip, 2022, 22, 2657-2670.	6.0	18
15	Ptychographic sensor for large-scale lensless microbial monitoring with high spatiotemporal resolution. Biosensors and Bioelectronics, 2022, 196, 113699.	10.1	17
16	Quantitative multi-height phase retrieval via a coded image sensor. Biomedical Optics Express, 2021, 12, 7173.	2.9	15
17	Synthetic aperture ptychography: coded sensor translation for joint spatial-Fourier bandwidth expansion. Photonics Research, 2022, 10, 1624.	7.0	13
18	Rapid and robust whole slide imaging based on LED-array illumination and color-multiplexed single-shot autofocusing. Quantitative Imaging in Medicine and Surgery, 2019, 9, 823-831.	2.0	12

#	ARTICLE	IF	CITATIONS
19	Optofluidic ptychography on a chip. <i>Lab on A Chip</i> , 2021, 21, 4549-4556.	6.0	12
20	Deep learning-enabled whole slide imaging (DeepWSI): oil-immersion quality using dry objectives, longer depth of field, higher system throughput, and better functionality. <i>Optics Express</i> , 2021, 29, 39669.	3.4	12
21	Fourier ptychographic microscopy with sparse representation. <i>Scientific Reports</i> , 2017, 7, 8664.	3.3	11
22	High-throughput lensless whole slide imaging via continuous height-varying modulation of a tilted sensor. <i>Optics Letters</i> , 2021, 46, 5212.	3.3	11
23	Group-based sparse representation for Fourier ptychography microscopy. <i>Optics Communications</i> , 2017, 404, 55-61.	2.1	10
24	Brightfield, fluorescence, and phase-contrast whole slide imaging via dual-LED autofocusing. <i>Biomedical Optics Express</i> , 2021, 12, 4651.	2.9	6
25	Ptychography-based high-throughput lensless on-chip microscopy via incremental proximal algorithms. <i>Optics Express</i> , 2021, 29, 37892.	3.4	6
26	Bypassing the resolution limit of diffractive zone plate optics via rotational Fourier ptychography. <i>Optics Communications</i> , 2021, 493, 127031.	2.1	1