

Stephen A Boppart

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

423 papers	15,732 citations	65 h-index	110 g-index
528 ext. papers	18,961 ext. citations	4.7 avg, IF	6.54 L-index

#	Paper	IF	Citations
423	In vivo endoscopic optical biopsy with optical coherence tomography. <i>Science</i> , 1997 , 276, 2037-9	33.3	1060
422	Optical biopsy and imaging using optical coherence tomography. <i>Nature Medicine</i> , 1995 , 1, 970-2	50.5	660
421	Optical coherence tomography: an emerging technology for biomedical imaging and optical biopsy. <i>Neoplasia</i> , 2000 , 2, 9-25	6.4	568
420	Optical coherence tomography: a review of clinical development from bench to bedside. <i>Journal of Biomedical Optics</i> , 2007 , 12, 051403	3.5	349
419	Biomechanical properties of in vivo human skin from dynamic optical coherence elastography. <i>IEEE Transactions on Biomedical Engineering</i> , 2010 , 57, 953-9	5	286
418	Interferometric synthetic aperture microscopy. <i>Nature Physics</i> , 2007 , 3, 129-134	16.2	275
417	Intraoperative evaluation of breast tumor margins with optical coherence tomography. <i>Cancer Research</i> , 2009 , 69, 8790-6	10.1	259
416	Multimodal biomedical imaging with asymmetric single-walled carbon nanotube/iron oxide nanoparticle complexes. <i>Nano Letters</i> , 2007 , 7, 861-7	11.5	250
415	High-resolution optical coherence tomographic imaging using a mode-locked Ti:Al(2)O(3) laser source. <i>Optics Letters</i> , 1995 , 20, 1486-8	3	231
414	In vivo cellular optical coherence tomography imaging. <i>Nature Medicine</i> , 1998 , 4, 861-5	50.5	212
413	Optical coherence tomography: advanced technology for the endoscopic imaging of Barrett's esophagus. <i>Endoscopy</i> , 2000 , 32, 921-30	3.4	199
412	Selective in vivo metabolic cell-labeling-mediated cancer targeting. <i>Nature Chemical Biology</i> , 2017 , 13, 415-424	11.7	188
411	Engineered microsphere contrast agents for optical coherence tomography. <i>Optics Letters</i> , 2003 , 28, 1546-8	3	187
410	Optical coherence tomography: feasibility for basic research and image-guided surgery of breast cancer. <i>Breast Cancer Research and Treatment</i> , 2004 , 84, 85-97	4.4	174
409	Plasmon-resonant gold nanorods as low backscattering albedo contrast agents for optical coherence tomography. <i>Optics Express</i> , 2006 , 14, 6724-38	3.3	143
408	Noninvasive assessment of the developing <i>Xenopus</i> cardiovascular system using optical coherence tomography. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 1997 , 94, 4256-61	11.5	138
407	Imaging of coronary artery microstructure (in vitro) with optical coherence tomography. <i>American Journal of Cardiology</i> , 1996 , 77, 92-3	3	131

406	Magnetomotive contrast for in vivo optical coherence tomography. <i>Optics Express</i> , 2005 , 13, 6597-614	3.3	128
405	Assessment of coronary plaque with optical coherence tomography and high-frequency ultrasound. <i>American Journal of Cardiology</i> , 2000 , 85, 641-4	3	127
404	Feasibility of optical coherence tomography for high-resolution imaging of human gastrointestinal tract malignancies. <i>Journal of Gastroenterology</i> , 2000 , 35, 87-92	6.9	126
403	Stain-free histopathology by programmable supercontinuum pulses. <i>Nature Photonics</i> , 2016 , 10, 534-540	33.9	125
402	Computational adaptive optics for broadband optical interferometric tomography of biological tissue. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2012 , 109, 7175-80	11.5	124
401	In vivo three-dimensional optical coherence elastography. <i>Optics Express</i> , 2011 , 19, 6623-34	3.3	123
400	Near-infrared dyes as contrast-enhancing agents for spectroscopic optical coherence tomography. <i>Optics Letters</i> , 2004 , 29, 1647-9	3	120
399	Fourier transform light scattering of inhomogeneous and dynamic structures. <i>Physical Review Letters</i> , 2008 , 101, 238102	7.4	116
398	Intravital imaging by simultaneous label-free autofluorescence-multiharmonic microscopy. <i>Nature Communications</i> , 2018 , 9, 2125	17.4	109
397	Optical micro-scale mapping of dynamic biomechanical tissue properties. <i>Optics Express</i> , 2008 , 16, 11052-35	3.5	108
396	Tumor targeting by surface-modified protein microspheres. <i>Journal of the American Chemical Society</i> , 2006 , 128, 3472-3	16.4	106
395	High-resolution optical coherence tomography-guided laser ablation of surgical tissue. <i>Journal of Surgical Research</i> , 1999 , 82, 275-84	2.5	106
394	Optical probes and techniques for molecular contrast enhancement in coherence imaging. <i>Journal of Biomedical Optics</i> , 2005 , 10, 41208	3.5	105
393	Handheld optical coherence tomography scanner for primary care diagnostics. <i>IEEE Transactions on Biomedical Engineering</i> , 2011 , 58, 741-4	5	103
392	Optical coherence tomography for neurosurgical imaging of human intracortical melanoma. <i>Neurosurgery</i> , 1998 , 43, 834-41	3.2	101
391	Optical coherence elastography of engineered and developing tissue. <i>Tissue Engineering</i> , 2006 , 12, 63-73		100
390	Imaging magnetically labeled cells with magnetomotive optical coherence tomography. <i>Optics Letters</i> , 2005 , 30, 747-9	3	97
389	Nonlinear interferometric vibrational imaging. <i>Physical Review Letters</i> , 2004 , 92, 123905	7.4	96

388	Investigation of developing embryonic morphology using optical coherence tomography. <i>Developmental Biology</i> , 1996 , 177, 54-63	3.1	96
387	Computational high-resolution optical imaging of the living human retina. <i>Nature Photonics</i> , 2015 , 9, 440-443	33.9	95
386	In vivo magnetomotive optical molecular imaging using targeted magnetic nanoprobe. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2010 , 107, 8085-90	11.5	94
385	A first-order model for computation of laser-induced breakdown thresholds in ocular and aqueous media. II. Comparison to experiment. <i>IEEE Journal of Quantum Electronics</i> , 1995 , 31, 2250-2257	2	94
384	A flexible perforated microelectrode array for extended neural recordings. <i>IEEE Transactions on Biomedical Engineering</i> , 1992 , 39, 37-42	5	94
383	Optical biopsy with optical coherence tomography: feasibility for surgical diagnostics. <i>Journal of Surgical Research</i> , 1997 , 71, 32-40	2.5	93
382	Study of an ultrahigh-numerical-aperture fiber continuum generation source for optical coherence tomography. <i>Optics Letters</i> , 2002 , 27, 2010-2	3	93
381	Inverse scattering for optical coherence tomography. <i>Journal of the Optical Society of America A: Optics and Image Science, and Vision</i> , 2006 , 23, 1027-37	1.8	91
380	Microscopic imaging and spectroscopy with scattered light. <i>Annual Review of Biomedical Engineering</i> , 2010 , 12, 285-314	12	90
379	Intraoperative assessment of microsurgery with three-dimensional optical coherence tomography. <i>Radiology</i> , 1998 , 208, 81-6	20.5	90
378	Real-time Imaging of the Resection Bed Using a Handheld Probe to Reduce Incidence of Microscopic Positive Margins in Cancer Surgery. <i>Cancer Research</i> , 2015 , 75, 3706-12	10.1	87
377	Coherent fiber supercontinuum for biophotonics. <i>Laser and Photonics Reviews</i> , 2013 , 7, 628	8.3	86
376	Computational methods for analysis of human breast tumor tissue in optical coherence tomography images. <i>Journal of Biomedical Optics</i> , 2006 , 11, 054015	3.5	83
375	Noninvasive in vivo optical detection of biofilm in the human middle ear. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2012 , 109, 9529-34	11.5	82
374	Nonlinear optical contrast enhancement for optical coherence tomography. <i>Optics Express</i> , 2004 , 12, 331-41	3.3	80
373	Spectroscopic spectral-domain optical coherence microscopy. <i>Optics Letters</i> , 2006 , 31, 1079-81	3	79
372	Magnetomotive nanoparticle transducers for optical rheology of viscoelastic materials. <i>Optics Express</i> , 2009 , 17, 23114-22	3.3	78
371	High-resolution three-dimensional imaging of biofilm development using optical coherence tomography. <i>Journal of Biomedical Optics</i> , 2006 , 11, 34001	3.5	77

370	HIGH-RESOLUTION IMAGING OF GYNECOLOGIC NEOPLASMS USING OPTICAL COHERENCE TOMOGRAPHY. <i>Obstetrics and Gynecology</i> , 1999 , 93, 135-139	4.9	77
369	Intraoperative Assessment of Final Margins with a Handheld Optical Imaging Probe During Breast-Conserving Surgery May Reduce the Reoperation Rate: Results of a Multicenter Study. <i>Annals of Surgical Oncology</i> , 2015 , 22, 3356-62	3.1	75
368	Imaging gold nanorods in excised human breast carcinoma by spectroscopic optical coherence tomography. <i>Journal of Materials Chemistry</i> , 2009 , 19, 6407		74
367	Phase-resolved magnetomotive OCT for imaging nanomolar concentrations of magnetic nanoparticles in tissues. <i>Optics Express</i> , 2008 , 16, 11525	3.3	74
366	Images in cardiovascular medicine. Catheter-based optical imaging of a human coronary artery. <i>Circulation</i> , 1996 , 94, 3013	16.7	72
365	Spectroscopic optical coherence elastography. <i>Optics Express</i> , 2010 , 18, 25519-34	3.3	71
364	Wavelength-dependent scattering in spectroscopic optical coherence tomography. <i>Optics Express</i> , 2005 , 13, 5450-62	3.3	71
363	Roles of ionic strength and biofilm roughness on adhesion kinetics of Escherichia coli onto groundwater biofilm grown on PVC surfaces. <i>Water Research</i> , 2013 , 47, 2531-42	12.5	70
362	Optical coherence tomography of cell dynamics in three-dimensional tissue models. <i>Optics Express</i> , 2006 , 14, 7159-71	3.3	70
361	Real-time computed optical interferometric tomography. <i>Nature Photonics</i> , 2013 , 7, 444-448	33.9	68
360	Role of biofilm roughness and hydrodynamic conditions in Legionella pneumophila adhesion to and detachment from simulated drinking water biofilms. <i>Environmental Science & Technology</i> , 2015 , 49, 4274-82	10.3	67
359	New technology for high-speed and high-resolution optical coherence tomography. <i>Annals of the New York Academy of Sciences</i> , 1998 , 838, 95-107	6.5	66
358	Review of optical coherence tomography in oncology. <i>Journal of Biomedical Optics</i> , 2017 , 22, 1-23	3.5	64
357	Digital algorithm for dispersion correction in optical coherence tomography for homogeneous and stratified media. <i>Applied Optics</i> , 2003 , 42, 204-17	1.7	64
356	Phase-resolved magnetomotive OCT for imaging nanomolar concentrations of magnetic nanoparticles in tissues. <i>Optics Express</i> , 2008 , 16, 11525-39	3.3	64
355	Argon laser retinal lesions evaluated in vivo by optical coherence tomography. <i>American Journal of Ophthalmology</i> , 1997 , 123, 188-98	4.9	62
354	Speckle reduction by l-divergence regularization in optical coherence tomography. <i>Journal of the Optical Society of America A: Optics and Image Science, and Vision</i> , 2005 , 22, 2366-71	1.8	62
353	Functional optical coherence tomography for detecting neural activity through scattering changes. <i>Optics Letters</i> , 2003 , 28, 1218-20	3	62

352	Point-of-care and point-of-procedure optical imaging technologies for primary care and global health. <i>Science Translational Medicine</i> , 2014 , 6, 253rv2	17.5	61
351	Integrated structural and functional optical imaging combining spectral-domain optical coherence and multiphoton microscopy. <i>Applied Physics Letters</i> , 2006 , 88, 053901	3.4	61
350	Separation of absorption and scattering profiles in spectroscopic optical coherence tomography using a least-squares algorithm. <i>Optics Express</i> , 2004 , 12, 4790-803	3.3	61
349	Optical coherence tomography: the intraoperative assessment of lymph nodes in breast cancer. <i>IEEE Engineering in Medicine and Biology Magazine</i> , 2010 , 29, 63-70		60
348	Use of DNA and peptide nucleic acid molecular beacons for detection and quantification of rRNA in solution and in whole cells. <i>Applied and Environmental Microbiology</i> , 2003 , 69, 5673-8	4.8	60
347	Optical biopsy of lymph node morphology using optical coherence tomography. <i>Technology in Cancer Research and Treatment</i> , 2005 , 4, 539-48	2.7	59
346	Imaging developing neural morphology using optical coherence tomography. <i>Journal of Neuroscience Methods</i> , 1996 , 70, 65-72	3	59
345	Optical coherence tomography: technology and applications for neuroimaging. <i>Psychophysiology</i> , 2003 , 40, 529-41	4.1	58
344	Real-time interferometric synthetic aperture microscopy. <i>Optics Express</i> , 2008 , 16, 2555-69	3.3	56
343	Structural and functional imaging of 3D microfluidic mixers using optical coherence tomography. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2004 , 101, 7516-21	11.5	56
342	Imaging and analysis of three-dimensional cell culture models. <i>Methods in Molecular Biology</i> , 2010 , 591, 211-27	1.4	55
341	Refractive index of carcinogen-induced rat mammary tumours. <i>Physics in Medicine and Biology</i> , 2006 , 51, 2165-77	3.8	55
340	Structural and functional optical imaging of three-dimensional engineered tissue development. <i>Tissue Engineering</i> , 2004 , 10, 1747-56		54
339	Autofocus algorithm for dispersion correction in optical coherence tomography. <i>Applied Optics</i> , 2003 , 42, 3038-46	1.7	54
338	Full-range k-domain linearization in spectral-domain optical coherence tomography. <i>Applied Optics</i> , 2011 , 50, 1158-63	0.2	53
337	Dynamic spectral-domain optical coherence elastography for tissue characterization. <i>Optics Express</i> , 2010 , 18, 14183-90	3.3	53
336	Imaging engineered tissues using structural and functional optical coherence tomography. <i>Journal of Biophotonics</i> , 2009 , 2, 643-55	3.1	53
335	Three-dimensional optical coherence tomography of the embryonic murine cardiovascular system. <i>Journal of Biomedical Optics</i> , 2006 , 11, 021014	3.5	53

334	Resonant acoustic spectroscopy of soft tissues using embedded magnetomotive nanotransducers and optical coherence tomography. <i>Physics in Medicine and Biology</i> , 2010 , 55, 1189-201	3.8	52
333	Characterization and Analysis of Relative Intensity Noise in Broadband Optical Sources for Optical Coherence Tomography. <i>IEEE Photonics Technology Letters</i> , 2010 , 22, 1057-1059	2.2	52
332	Optical properties of tissues quantified by Fourier-transform light scattering. <i>Optics Letters</i> , 2009 , 34, 1372-4	3	52
331	Optical frequency up-conversion by supercontinuum-free widely-tunable fiber-optic Cherenkov radiation. <i>Optics Express</i> , 2009 , 17, 9858-72	3.3	52
330	Optical biopsy in human pancreatobiliary tissue using optical coherence tomography. <i>Digestive Diseases and Sciences</i> , 1998 , 43, 1193-9	4	51
329	Noninvasive depth-resolved optical measurements of the tympanic membrane and middle ear for differentiating otitis media. <i>Laryngoscope</i> , 2015 , 125, E276-82	3.6	50
328	In vivo detection of exercised-induced ultrastructural changes in genetically-altered murine skeletal muscle using polarization-sensitive optical coherence tomography. <i>Optics Express</i> , 2006 , 14, 1547-56	3.3	50
327	Tailoring hydrogel adhesion to polydimethylsiloxane substrates using polysaccharide glue. <i>Angewandte Chemie - International Edition</i> , 2013 , 52, 6949-52	16.4	49
326	Wave-breaking-extended fiber supercontinuum generation for high compression ratio transform-limited pulse compression. <i>Optics Letters</i> , 2012 , 37, 2172-4	3	49
325	Spectroscopic Optical Coherence Tomography and Microscopy. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2007 , 13, 1629-1640	3.8	48
324	Differentiation of ex vivo human breast tissue using polarization-sensitive optical coherence tomography. <i>Biomedical Optics Express</i> , 2014 , 5, 3417-26	3.5	47
323	DYNAMIC OPTICAL COHERENCE ELASTOGRAPHY: A REVIEW. <i>Journal of Innovative Optical Health Sciences</i> , 2010 , 3, 221-233	1.2	47
322	Inverse scattering for frequency-scanned full-field optical coherence tomography. <i>Journal of the Optical Society of America A: Optics and Image Science, and Vision</i> , 2007 , 24, 1034-41	1.8	47
321	Deconvolution methods for mitigation of transverse blurring in optical coherence tomography. <i>IEEE Transactions on Image Processing</i> , 2005 , 14, 1254-64	8.7	47
320	Interferometric differentiation between resonant coherent anti-Stokes Raman scattering and nonresonant four-wave-mixing processes. <i>Applied Physics Letters</i> , 2004 , 85, 5787-5789	3.4	46
319	Optical coherence tomography for advanced screening in the primary care office. <i>Journal of Biophotonics</i> , 2014 , 7, 525-33	3.1	45
318	Intraoperative visualization of the tumor microenvironment and quantification of extracellular vesicles by label-free nonlinear imaging. <i>Science Advances</i> , 2018 , 4, eaau5603	14.3	45
317	Non-invasive, real-time reporting drug release in vitro and in vivo. <i>Chemical Communications</i> , 2015 , 51, 6948-51	5.8	44

316	Response of Simulated Drinking Water Biofilm Mechanical and Structural Properties to Long-Term Disinfectant Exposure. <i>Environmental Science & Technology</i> , 2016 , 50, 1779-87	10.3	44
315	Suppressing Short-term Polarization Noise and Related Spectral Decoherence in All-normal Dispersion Fiber Supercontinuum Generation. <i>Journal of Lightwave Technology</i> , 2015 , 33, 1814-1820	4	44
314	Acoustomotive optical coherence elastography for measuring material mechanical properties. <i>Optics Letters</i> , 2009 , 34, 2894-6	3	44
313	Targeted multifunctional multimodal protein-shell microspheres as cancer imaging contrast agents. <i>Molecular Imaging and Biology</i> , 2012 , 14, 17-24	3.8	42
312	Nonparaxial vector-field modeling of optical coherence tomography and interferometric synthetic aperture microscopy. <i>Journal of the Optical Society of America A: Optics and Image Science, and Vision</i> , 2007 , 24, 2527-42	1.8	42
311	Nonlinear polarization dynamics in a weakly birefringent all-normal dispersion photonic crystal fiber: toward a practical coherent fiber supercontinuum laser. <i>Optics Express</i> , 2012 , 20, 1113-28	3.3	41
310	Magnetomotive optical coherence elastography for microrheology of biological tissues. <i>Journal of Biomedical Optics</i> , 2013 , 18, 121504	3.5	40
309	Optical imaging technology in minimally invasive surgery. Current status and future directions. <i>Surgical Endoscopy and Other Interventional Techniques</i> , 1999 , 13, 718-22	5.2	40
308	Needle-based refractive index measurement using low-coherence interferometry. <i>Optics Letters</i> , 2007 , 32, 385-7	3	39
307	Intraoperative optical coherence tomography for assessing human lymph nodes for metastatic cancer. <i>BMC Cancer</i> , 2016 , 16, 144	4.8	38
306	Measuring the scattering parameters of tissues from quantitative phase imaging of thin slices. <i>Optics Letters</i> , 2011 , 36, 2281-3	3	38
305	Molecular histopathology by spectrally reconstructed nonlinear interferometric vibrational imaging. <i>Cancer Research</i> , 2010 , 70, 9562-9	10.1	38
304	High resolution imaging of endometriosis and ovarian carcinoma with optical coherence tomography: feasibility for laparoscopic-based imaging. <i>BJOG: an International Journal of Obstetrics and Gynaecology</i> , 1999 , 106, 1071-7	3.7	38
303	Computed optical interferometric tomography for high-speed volumetric cellular imaging. <i>Biomedical Optics Express</i> , 2014 , 5, 2988-3000	3.5	37
302	Numerical analysis of gradient index lens-based optical coherence tomography imaging probes. <i>Journal of Biomedical Optics</i> , 2010 , 15, 066027	3.5	37
301	Non-invasive optical interferometry for the assessment of biofilm growth in the middle ear. <i>Biomedical Optics Express</i> , 2010 , 1, 1104-1116	3.5	37
300	Molecularly sensitive optical coherence tomography. <i>Optics Letters</i> , 2005 , 30, 495-7	3	37
299	Investigation of bacterial biofilm in the human middle ear using optical coherence tomography and acoustic measurements. <i>Hearing Research</i> , 2013 , 301, 193-200	3.9	36

298	Inverse scattering for high-resolution interferometric microscopy. <i>Optics Letters</i> , 2006 , 31, 3585-7	3	36
297	Non-invasive optical assessment of viscosity of middle ear effusions in otitis media. <i>Journal of Biophotonics</i> , 2017 , 10, 394-403	3.1	35
296	Multimodal Skin Imaging with Integrated Optical Coherence and Multiphoton Microscopy. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2012 , 18, 1280-1286	3.8	35
295	Real-time three-dimensional optical coherence tomography image-guided core-needle biopsy system. <i>Biomedical Optics Express</i> , 2012 , 3, 1149-61	3.5	35
294	Comparative performance analysis of time-frequency distributions for spectroscopic optical coherence tomography. <i>Applied Optics</i> , 2005 , 44, 1813-22	1.7	35
293	Computational optical coherence tomography [Invited]. <i>Biomedical Optics Express</i> , 2017 , 8, 1549-1574	3.5	34
292	Clinical feasibility of microscopically-guided breast needle biopsy using a fiber-optic probe with computer-aided detection. <i>Technology in Cancer Research and Treatment</i> , 2009 , 8, 315-21	2.7	34
291	Magnetomotive optical coherence elastography using magnetic particles to induce mechanical waves. <i>Biomedical Optics Express</i> , 2014 , 5, 2349-61	3.5	33
290	Real-Time Optical Coherence Tomography for Minimally Invasive Imaging of Prostate Ablation. <i>Computer Aided Surgery</i> , 2001 , 6, 94-103		33
289	Two- and three-dimensional high-resolution imaging of the human oviduct with optical coherence tomography. <i>Fertility and Sterility</i> , 1998 , 70, 155-8	4.8	33
288	Clinical translation of handheld optical coherence tomography: practical considerations and recent advancements. <i>Journal of Biomedical Optics</i> , 2017 , 22, 1-30	3.5	33
287	Integrated multimodal optical microscopy for structural and functional imaging of engineered and natural skin. <i>Journal of Biophotonics</i> , 2012 , 5, 437-48	3.1	32
286	Cross-correlation-based image acquisition technique for manually-scanned optical coherence tomography. <i>Optics Express</i> , 2009 , 17, 8125-36	3.3	32
285	Guide-star-based computational adaptive optics for broadband interferometric tomography. <i>Applied Physics Letters</i> , 2012 , 101, 221117	3.4	31
284	Optical biopsy with optical coherence tomography. <i>Annals of the New York Academy of Sciences</i> , 1998 , 838, 68-74	6.5	31
283	Interferometric Synthetic Aperture Microscopy: Computed Imaging for Scanned Coherent Microscopy. <i>Sensors</i> , 2008 , 8, 3903-3931	3.8	31
282	Three-dimensional motion correction using speckle and phase for in vivo computed optical interferometric tomography. <i>Biomedical Optics Express</i> , 2014 , 5, 4131-43	3.5	30
281	Multimodal Nonlinear Microscopy by Shaping a Fiber Supercontinuum From 900 to 1160 nm. <i>IEEE Journal of Selected Topics in Quantum Electronics</i> , 2012 , 18,	3.8	30

280	Detecting intrinsic scattering changes correlated to neuron action potentials using optical coherence imaging. <i>Optics Express</i> , 2009 , 17, 13447-57	3.3	30
279	Real-time automated thickness measurement of the in vivo human tympanic membrane using optical coherence tomography. <i>Quantitative Imaging in Medicine and Surgery</i> , 2015 , 5, 69-77	3.6	30
278	Label-free visualization and characterization of extracellular vesicles in breast cancer. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019 , 116, 24012-24018	11.5	30
277	Stability in computed optical interferometric tomography (part I): stability requirements. <i>Optics Express</i> , 2014 , 22, 19183-97	3.3	29
276	Scalar generalized nonlinear Schrödinger equation-quantified continuum generation in an all-normal dispersion photonic crystal fiber for broadband coherent optical sources. <i>Optics Express</i> , 2010 , 18, 27872-84	3.3	28
275	All-fiber femtosecond Cherenkov radiation source. <i>Optics Letters</i> , 2012 , 37, 2769-71	3	28
274	Fast-Fourier-domain delay line for in vivo optical coherence tomography with a polygonal scanner. <i>Applied Optics</i> , 2003 , 42, 4606-11	1.7	28
273	Noninvasive in vivo optical coherence tomography tracking of chronic otitis media in pediatric subjects after surgical intervention. <i>Journal of Biomedical Optics</i> , 2017 , 22, 1-11	3.5	28
272	High speed nonlinear interferometric vibrational analysis of lipids by spectral decomposition. <i>Analytical Chemistry</i> , 2010 , 82, 3812-8	7.8	27
271	Real-time digital signal processing-based optical coherence tomography and Doppler optical coherence tomography. <i>IEEE Transactions on Biomedical Engineering</i> , 2004 , 51, 186-90	5	27
270	Concurrence of extracellular vesicle enrichment and metabolic switch visualized label-free in the tumor microenvironment. <i>Science Advances</i> , 2017 , 3, e1600675	14.3	26
269	Correction of coherence gate curvature in high numerical aperture optical coherence imaging. <i>Optics Letters</i> , 2010 , 35, 3120-2	3	26
268	Projected index computed tomography. <i>Optics Letters</i> , 2003 , 28, 701-3	3	26
267	Label-free optical imaging technologies for rapid translation and use during intraoperative surgical and tumor margin assessment. <i>Journal of Biomedical Optics</i> , 2017 , 23, 1-10	3.5	26
266	Raman Spectroscopic Analysis Reveals Abnormal Fatty Acid Composition in Tumor Micro- and Macroenvironments in Human Breast and Rat Mammary Cancer. <i>Scientific Reports</i> , 2016 , 6, 32922	4.9	25
265	Three-dimensional optical coherence tomography for optical biopsy of lymph nodes and assessment of metastatic disease. <i>Annals of Surgical Oncology</i> , 2013 , 20, 3685-93	3.1	25
264	Broadband nonlinear vibrational spectroscopy by shaping a coherent fiber supercontinuum. <i>Optics Express</i> , 2013 , 21, 8269-75	3.3	24
263	Imaging cellular responses to mechanical stimuli within three-dimensional tissue constructs. <i>Microscopy Research and Technique</i> , 2007 , 70, 361-71	2.8	24

262	High-spectral-resolution coherent anti-Stokes Raman scattering with interferometrically detected broadband chirped pulses. <i>Optics Letters</i> , 2006 , 31, 1543-5	3	24
261	High-speed imaging of transient metabolic dynamics using two-photon fluorescence lifetime imaging microscopy. <i>Optica</i> , 2018 , 5, 1290-1296	8.6	24
260	Bright broadband coherent fiber sources emitting strongly blue-shifted resonant dispersive wave pulses. <i>Optics Express</i> , 2013 , 21, 23188-96	3.3	23
259	Cross-validation of interferometric synthetic aperture microscopy and optical coherence tomography. <i>Optics Letters</i> , 2010 , 35, 1683-5	3	23
258	Low-cost hand-held probe for depth-resolved low-coherence interferometry. <i>Biomedical Optics Express</i> , 2017 , 8, 338-348	3.5	22
257	In Vivo Multiphoton Microscopy for Investigating Biomechanical Properties of Human Skin. <i>Cellular and Molecular Bioengineering</i> , 2011 , 4, 231-238	3.9	22
256	Slide-free virtual histochemistry (Part I): development via nonlinear optics. <i>Biomedical Optics Express</i> , 2018 , 9, 5240-5252	3.5	22
255	Progress in Cherenkov femtosecond fiber lasers. <i>Journal Physics D: Applied Physics</i> , 2016 , 49,	3	22
254	Quantitative FRET imaging to visualize the invasiveness of live breast cancer cells. <i>PLoS ONE</i> , 2013 , 8, e58569	3.7	21
253	Label-free in vivo cellular-level detection and imaging of apoptosis. <i>Journal of Biophotonics</i> , 2017 , 10, 143-150	3.1	20
252	Effect of divalent ions and a polyphosphate on composition, structure, and stiffness of simulated drinking water biofilms. <i>Npj Biofilms and Microbiomes</i> , 2018 , 4, 15	8.2	20
251	Partially coherent illumination in full-field interferometric synthetic aperture microscopy. <i>Journal of the Optical Society of America A: Optics and Image Science, and Vision</i> , 2009 , 26, 376-86	1.8	20
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