David J Spence

List of Publications by Year in Descending Order

103 papers	2,393 citations	25 h-index	45 g-index
143 ext. papers	2,950 ext. citations	3.4 avg, IF	5.18 L-index

#	Paper	IF	Citations
103	Spectral synthesis of multimode lasers to the Fourier limit in integrated Fabry-Perot diamond resonators. *Optica*, **2022**, 9, 317	8.6	4
102	Diamond Raman laser and Yb fiber amplifier for multiphoton fluorescence microscopy.. *Biomedical Optics Express*, **2022**, 13, 1888-1898	3.5	0
101	Modelling and characterisation of continuous wave resonantly pumped diamond Raman lasers. *Optics Express*, **2021**, 29, 18427-18436	3.3	1
100	Absorptive laser threshold magnetometry: combining visible diamond Raman lasers and nitrogen-vacancy centres. *Materials for Quantum Technology*, **2021**, 1, 025003		1
99	Generation of sub-100 fs ultraviolet pulses from a Kerr-lens mode-locked Ce:LiCAF laser. *Applied Optics*, **2021**, 60, 8316-8320	1.7	0
98	Terahertz sources based on stimulated polariton scattering. *Progress in Quantum Electronics*, **2020**, 71, 100254	9.1	1
97	Femtosecond Ultraviolet Pulses Generated Directly From a Mode-Locked Ce:LiCAF Laser **2020**,		1
96	Asynchronous Cross-Correlation Using a Time Reference **2020**,		1
95	Investigating single-longitudinal-mode operation of a continuous wave second Stokes diamond Raman ring laser. *Optics Express*, **2020**, 28, 1738-1744	3.3	8
94	Broadly tunable linewidth-invariant Raman Stokes comb for selective resonance photoionization. *Optics Express*, **2020**, 28, 8589-8600	3.3	4
93	Analysis of a thermal lens in a diamond Raman laser operating at 1.1 kW output power. *Optics Express*, **2020**, 28, 15232-15239	3.3	9
92	Diamond sodium guide star laser. *Optics Letters*, **2020**, 45, 1898-1901	3	19
91	Linewidth-narrowing of a continuous wave terahertz polariton laser using an intracavity etalon. *Optics Letters*, **2020**, 45, 157	3	2
90	Intracavity THz Polariton Source Using a Shallow-Bounce Configuration. *IEEE Transactions on Terahertz Science and Technology*, **2019**, 9, 237-242	3.4	2
89	Analytic theory for lasers based on stimulated polariton scattering. *Journal of the Optical Society of America B: Optical Physics*, **2019**, 36, 1706	1.7	5
88	A single-frequency intracavity Raman laser. *Optics Express*, **2019**, 27, 8540-8553	3.3	23
87	Generalised theory of polarisation modes for resonators containing birefringence and anisotropic gain. *Optics Express*, **2019**, 27, 17209-17220	3.3	4

86	Single-frequency 620 nm diamond laser at high power, stabilized via harmonic self-suppression and spatial-hole-burning-free gain. *Optics Letters*, **2019**, 44, 839-842	3	24
85	1.2 kW quasi-steady-state diamond Raman laser pumped by an M = 15 beam. *Optics Letters*, **2019**, 44, 2506-2509	3	20
84	Continuously tunable diamond Raman laser for resonance laser ionization. *Optics Letters*, **2019**, 44, 3924-3927	3	7
83	Single-longitudinal-mode diamond laser stabilization using polarization-dependent Raman gain. *OSA Continuum*, **2019**, 2, 1028	1.4	9
82	. *IEEE Journal of Selected Topics in Quantum Electronics*, **2018**, 24, 1-6	3.8	12
81	High Power Diamond Raman Lasers. *IEEE Journal of Selected Topics in Quantum Electronics*, **2018**, 24, 1-14	3.8	33
80	302 W quasi-continuous cascaded diamond Raman laser at 1.5 microns with large brightness enhancement. *Optics Express*, **2018**, 26, 19797-19803	3.3	17
79	Wavelength tuning and power enhancement of an intracavity Nd:GdVO-BaWO Raman laser using an etalon. *Optics Express*, **2018**, 26, 32145-32155	3.3	22
78	Plasmonic second-harmonic generation in gold:lithium niobate thin films. *Journal of the Optical Society of America B: Optical Physics*, **2018**, 35, 302	1.7	3
77	Spectral effects of stimulated Raman scattering in crystals. *Progress in Quantum Electronics*, **2017**, 51, 1-45	9.1	29
76	Diamond-based concept for combining beams at very high average powers. *Laser and Photonics Reviews*, **2017**, 11, 1600130	8.3	11
75	Imaging free and bound NADH towards cancer tissue detection using FLIM system based on SPAD array **2017**,		1
74	Cascaded continuous-wave Raman frequency conversion in external-cavity diamond lasers **2017**,		1
73	Single-longitudinal-mode ring diamond Raman laser. *Optics Letters*, **2017**, 42, 1229-1232	3	17
72	Tunable THz polariton laser based on 1342 nm wavelength for enhanced terahertz wave extraction. *Optics Letters*, **2017**, 42, 2691-2694	3	10
71	Two-color multiphoton imaging with a femtosecond diamond Raman laser. *Light: Science and Applications*, **2017**, 6,	16.7	27
70	High-power continuous-wave Raman frequency conversion from 1.06 μm to 1.49 μm in diamond. *Optics Express*, **2017**, 25, 749-757	3.3	28
69	Compact integrated actively Q-switched waveguide laser. *Optics Express*, **2017**, 25, 1692-1701	3.3	15

68	THz polariton laser using an intracavity Mg:LiNbO3 crystal with protective Teflon coating. *Optics Express*, **2017**, 25, 3991-3999	3.3	17
67	Ultrafast second-Stokes diamond Raman laser. *Optics Express*, **2016**, 24, 8149-55	3.3	7
66	Stimulated polariton scattering in an intracavity RbTiOPO4 crystal generating frequency-tunable THz output. *Optics Express*, **2016**, 24, 10254-64	3.3	28
65	Tunable terahertz generation in the picosecond regime from the stimulated polariton scattering in a LiNbO3 crystal. *Optics Letters*, **2016**, 41, 4409-12	3	6
64	Two-Color, Two-Photon Imaging at Long Excitation Wavelengths Using a Diamond Raman Laser. *Microscopy and Microanalysis*, **2016**, 22, 803-7	0.5	5
63	25.5 fs dissipative soliton diamond Raman laser. *Optics Letters*, **2016**, 41, 1861-4	3	16
62	Intrinsically stable high-power single longitudinal mode laser using spatial hole burning free gain. *Optica*, **2016**, 3, 876	8.6	35
61	Efficient diamond Raman laser generating 65 fs pulses. *Optics Express*, **2015**, 23, 15504-13	3.3	23
60	Modelling and optimization of continuous-wave external cavity Raman lasers. *Optics Express*, **2015**, 23, 8590-602	3.3	24
59	Linewidth narrowing of a tunable mode-locked pumped continuous-wave Ce:LiCAF laser. *Optics Letters*, **2015**, 40, 3065-8	3	4
58	Dynamics of solid-state lasers pumped by mode-locked lasers. *Optics Express*, **2015**, 23, 4441-52	3.3	4
57	SRS in the strong-focusing regime for Raman amplifiers. *Optics Express*, **2015**, 23, 15012-20	3.3	7
56	Pump–Probe Measurements of the Raman Gain Coefficient in Crystals Using Multi-Longitudinal-Mode Beams. *IEEE Journal of Quantum Electronics*, **2015**, 51, 1-8	2	17
55	Spatial and Spectral Effects in Continuous-Wave Intracavity Raman Lasers. *IEEE Journal of Selected Topics in Quantum Electronics*, **2015**, 21, 134-141	3.8	21
54	Multiwavelength ultrafast LiNbO(3) Raman laser. *Optics Express*, **2015**, 23, 25582-7	3.3	12
53	Continuous-wave ultraviolet Ce:LiCAF laser **2015**,		1
52	Ti:sapphire-pumped diamond Raman laser with sub-100-fs pulse duration. *Optics Letters*, **2014**, 39, 2975-8	3	16
51	Non-Collinear Beam Combining of Kilowatt Beams in a Diamond Raman Amplifier **2014**,		2

50	Tunable continuous-wave deep-ultraviolet laser based on Ce:LiCAF. *Optics Letters*, **2014**, 39, 1306-9	3	12
49	Highly efficient picosecond diamond Raman laser at 1240 and 1485 nm. *Optics Express*, **2014**, 22, 3325-33	3.3	38
48	Investigation of blue emission from Raman-active crystals: Its origin and impact on laser performance. *Optical Materials Express*, **2014**, 4, 889	2.6	11
47	Spectral broadening in continuous-wave intracavity Raman lasers. *Optics Express*, **2014**, 22, 7492-502	3.3	36
46	Diamond Raman Laser Design and Performance **2013**, 239-276		24
45	Modeling of wavelength-selectable visible Raman lasers. *Optics Communications*, **2012**, 285, 3849-3854	2	9
44	Scaling Q-switched microchip lasers for shortest pulses. *Applied Physics B: Lasers and Optics*, **2012**, 109, 81-88	1.9	13
43	Control of cascading in multiple-order Raman lasers. *Optics Letters*, **2012**, 37, 3840-2	3	11
42	Managing SRS competition in a miniature visible Nd:YVO4/BaWO4 Raman laser. *Optics Express*, **2012**, 20, 19305-12	3.3	9
41	Continuous-wave VECSEL Raman laser with tunable lime-yellow-orange output. *Optics Express*, **2012**, 20, 5219-24	3.3	11
40	Deep ultraviolet diamond Raman laser. *Optics Express*, **2011**, 19, 10857-63	3.3	59
39	Miniature wavelength-selectable Raman laser: new insights for optimizing performance. *Optics Express*, **2011**, 19, 25623-31	3.3	25
38	Characteristics of 2-photon ultraviolet laser etching of diamond. *Optical Materials Express*, **2011**, 1, 576	2.6	19
37	. *IEEE Journal of Quantum Electronics*, **2011**, 47, 314-319	2	2
36	Multi-wavelength, all-solid-state, continuous wave mode locked picosecond Raman laser. *Optics Express*, **2010**, 18, 5289-94	3.3	25
35	Study of relaxation oscillations in continuous-wave intracavity Raman lasers. *Optics Express*, **2010**, 18, 11530-6	3.3	10
34	A wavelength-versatile, continuous-wave, self-Raman solid-state laser operating in the visible. *Optics Express*, **2010**, 18, 20013-8	3.3	68
33	Pulse compression in synchronously pumped mode locked Raman lasers. *Optics Express*, **2010**, 18, 20422-37	3.3	16

32	Mode-locked picosecond diamond Raman laser. *Optics Letters*, **2010**, 35, 556-8	3	45
31	Efficient 5.3 W cw laser at 559 nm by intracavity frequency summation of fundamental and first-Stokes wavelengths in a self-Raman Nd:GdVO4 laser. *Optics Letters*, **2010**, 35, 682-4	3	56
30	KGW and diamond picosecond visible Raman lasers **2010**,		1
29	Cerium lasers generate ultrafast deep ultraviolet pulses **2010**,		1
28	Asynchronous cross-correlation for weak ultrafast deep ultraviolet laser pulses. *Applied Physics B: Lasers and Optics*, **2009**, 97, 759-763	1.9	6
27	Mode-locked deep ultraviolet Ce:LiCAF laser. *Optics Letters*, **2009**, 34, 1660-2	3	22
26	Synchronously pumped continuous-wave mode-locked yellow Raman laser at 559 nm. *Optics Express*, **2009**, 17, 569-74	3.3	32
25	All-solid-state parametric Raman anti-Stokes laser at 508 nm. *Optics Express*, **2009**, 17, 810-8	3.3	25
24	Broadly tunable ultraviolet miniature cerium-doped LiLuF lasers. *Optics Express*, **2008**, 16, 2226-31	3.3	6
23	An investigation into Raman mode locking of fiber lasers. *Optics Express*, **2008**, 16, 5277-89	3.3	6
22	Laser-based volumetric flow visualization by digital color imaging of a spectrally coded volume. *Review of Scientific Instruments*, **2008**, 79, 013710	1.7	4
21	Wavelength-versatile visible and UV sources based on crystalline Raman lasers. *Progress in Quantum Electronics*, **2008**, 32, 121-158	9.1	120
20	Modeling of Continuous Wave Intracavity Raman Lasers. *IEEE Journal of Selected Topics in Quantum Electronics*, **2007**, 13, 756-763	3.8	42
19	Laser-based volumetric colour-coded three-dimensional particle velocimetry. *Optics and Lasers in Engineering*, **2007**, 45, 882-889	4.6	22
18	Continuous-wave, intracavity doubled, self-Raman laser operation in Nd:GdVO(4) at 586.5 nm. *Optics Express*, **2007**, 15, 7038-46	3.3	103
17	Mode locking using stimulated Raman scattering. *Optics Express*, **2007**, 15, 8170-5	3.3	8
16	Wedged etalon tuning for miniature and monolithic lasers. *Optics Letters*, **2006**, 31, 2296-8	3	3
15	Energy extraction from pulsed amplified stimulated emission lasers operating under conditions of strong saturation. *Journal of the Optical Society of America B: Optical Physics*, **2006**, 23, 1057	1.7	1

14	Low-threshold miniature Ce:LiCAF lasers. *Optics Communications*, **2006**, 262, 238-240	2	17
13	Slit beam shaping method for femtosecond laser direct-write fabrication of symmetric waveguides in bulk glasses. *Optics Express*, **2005**, 13, 5676-81	3.3	224
12	Dramatic enhancement of xuv laser output using a multimode gas-filled capillary waveguide. *Physical Review A*, **2005**, 71,	2.6	21
11	Simulations of recombination lasing in Ar7+ driven by optical field ionization in a capillary discharge waveguide. *Optics Communications*, **2005**, 249, 501-513	2	6
10	Progress in optical-field-ionization soft X-ray lasers at LOA. *Laser and Particle Beams*, **2005**, 23,	0.9	7
9	41.8□m Xe8+ laser driven in a plasma waveguide. *Physical Review A*, **2004**, 70,	2.6	10
8	Progress on collisionally pumped optical-field-ionization soft X-ray lasers. *IEEE Journal of Selected Topics in Quantum Electronics*, **2004**, 10, 1351-1362	3.8	1
7	Molecular-dynamic calculation of the inverse-bremsstrahlung heating of non-weakly-coupled plasmas. *Physical Review E*, **2004**, 70, 056411	2.4	20
6	Demonstration of a collisionally excited optical-field-ionization XUV laser driven in a plasma waveguide. *Physical Review Letters*, **2003**, 91, 205001	7.4	61
5	Simulations of a hydrogen-filled capillary discharge waveguide. *Physical Review E*, **2002**, 65, 016407	2.4	136
4	Guiding of high-intensity laser pulses with a hydrogen-filled capillary discharge waveguide. *Physical Review Letters*, **2002**, 89, 185003	7.4	166
3	First demonstration of guiding of high-intensity laser pulses in a hydrogen-filled capillary discharge waveguide. *Journal of Physics B: Atomic, Molecular and Optical Physics*, **2001**, 34, 4103-4112	1.3	37
2	Investigation of a hydrogen plasma waveguide. *Physical Review E*, **2001**, 63, 015401	2.4	148
1	Measurement of the electron-density profile in a discharge-ablated capillary waveguide. *Optics Letters*, **1999**, 24, 993-5	3	22