

Arnaud Couairon

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/8082706/publications.pdf>

Version: 2024-02-01

229
papers

13,126
citations

24978

57
h-index

23472

111
g-index

231
all docs

231
docs citations

231
times ranked

4274
citing authors

#	ARTICLE	IF	CITATIONS
1	Femtosecond filamentation in transparent media. <i>Physics Reports</i> , 2007, 441, 47-189.	10.3	2,462
2	Generation of intense, carrier-envelope phase-locked few-cycle laser pulses through filamentation. <i>Applied Physics B: Lasers and Optics</i> , 2004, 79, 673-677.	1.1	581
3	Conical Forward THz Emission from Femtosecond-Laser-Beam Filamentation in Air. <i>Physical Review Letters</i> , 2007, 98, 235002.	2.9	444
4	Femtosecond Laser-Induced Damage and Filamentary Propagation in Fused Silica. <i>Physical Review Letters</i> , 2002, 89, 186601.	2.9	399
5	Wavelength Scaling of Terahertz Generation by Gas Ionization. <i>Physical Review Letters</i> , 2013, 110, 253901.	2.9	310
6	Filamentation and damage in fused silica induced by tightly focused femtosecond laser pulses. <i>Physical Review B</i> , 2005, 71, .	1.1	306
7	Sharply autofocused ring-Airy beams transforming into non-linear intense light bullets. <i>Nature Communications</i> , 2013, 4, 2622.	5.8	290
8	Practitioner's guide to laser pulse propagation models and simulation. <i>European Physical Journal: Special Topics</i> , 2011, 199, 5-76.	1.2	285
9	Multi-octave supercontinuum generation from mid-infrared filamentation in a bulk crystal. <i>Nature Communications</i> , 2012, 3, 807.	5.8	243
10	Self-Guided Propagation of Ultrashort IR Laser Pulses in Fused Silica. <i>Physical Review Letters</i> , 2001, 87, 213902.	2.9	238
11	Breakup and Fusion of Self-Guided Femtosecond Light Pulses in Air. <i>Physical Review Letters</i> , 2001, 86, 5470-5473.	2.9	197
12	Organizing Multiple Femtosecond Filaments in Air. <i>Physical Review Letters</i> , 2004, 93, 035003.	2.9	197
13	Long-range self-channeling of infrared laser pulses in air: a new propagation regime without ionization. <i>Applied Physics B: Lasers and Optics</i> , 2004, 79, 379-382.	1.1	187
14	Range of plasma filaments created in air by a multi-terawatt femtosecond laser. <i>Optics Communications</i> , 2005, 247, 171-180.	1.0	184
15	Forward THz radiation emission by femtosecond filamentation in gases: theory and experiment. <i>New Journal of Physics</i> , 2008, 10, 013015.	1.2	178
16	Pulse self-compression to the single-cycle limit by filamentation in a gas with a pressure gradient. <i>Optics Letters</i> , 2005, 30, 2657.	1.7	177
17	Conical Emission, Pulse Splitting, and X-Wave Parametric Amplification in Nonlinear Dynamics of Ultrashort Light Pulses. <i>Physical Review Letters</i> , 2006, 96, 193901.	2.9	164
18	Self-compression of ultra-short laser pulses down to one optical cycle by filamentation. <i>Journal of Modern Optics</i> , 2006, 53, 75-85.	0.6	154

#	ARTICLE	IF	CITATIONS
19	Highly efficient broadband terahertz generation from ultrashort laser filamentation in liquids. Nature Communications, 2017, 8, 1184.	5.8	132
20	Filamentation in Kerr media from pulsed Bessel beams. Physical Review A, 2008, 77, .	1.0	131
21	Infrared femtosecond light filaments in air: simulations and experiments. Journal of the Optical Society of America B: Optical Physics, 2002, 19, 1117.	0.9	129
22	Stationary nonlinear Airy beams. Physical Review A, 2011, 84, .	1.0	123
23	Spatio-temporal characterization of few-cycle pulses obtained by filamentation. Optics Express, 2007, 15, 5394.	1.7	118
24	Self-Guided Propagation of Ultrashort Laser Pulses in the Anomalous Dispersion Region of Transparent Solids: A New Regime of Filamentation. Physical Review Letters, 2013, 110, 115003.	2.9	116
25	Nonlinear X-wave formation by femtosecond filamentation in Kerr media. Physical Review E, 2006, 73, 016608.	0.8	113
26	Self-compression to sub-3-cycle duration of mid-infrared optical pulses in dielectrics. Optics Express, 2013, 21, 28095.	1.7	111
27	Laser-assisted guiding of electric discharges around objects. Science Advances, 2015, 1, e1400111.	4.7	110
28	Scale-invariant nonlinear optics in gases. Optica, 2016, 3, 75.	4.8	107
29	Light Filaments in Air for Ultraviolet and Infrared Wavelengths. Physical Review Letters, 2002, 88, 135003.	2.9	102
30	Postcompression of picosecond pulses into the few-cycle regime. Optics Letters, 2020, 45, 2572.	1.7	95
31	Nonlinear propagation of self-guided ultra-short pulses in ionized gases. Physics of Plasmas, 2000, 7, 210-230.	0.7	92
32	Nature of Spatiotemporal Light Bullets in Bulk Kerr Media. Physical Review Letters, 2014, 112, 193901.	2.9	91
33	Time-resolved refractive index and absorption mapping of light-plasma filaments in water. Optics Letters, 2008, 33, 86.	1.7	89
34	[INVITED] Ultrafast laser micro- and nano-processing with nondiffracting and curved beams. Optics and Laser Technology, 2016, 80, 125-137.	2.2	88
35	Spatial mode cleaning by femtosecond filamentation in air. Optics Letters, 2006, 31, 2601.	1.7	83
36	Nonlinear propagation dynamics of finite-energy Airy beams. Physical Review A, 2012, 86, .	1.0	83

#	ARTICLE	IF	CITATIONS
37	Plasma Luminescence from Femtosecond Filaments in Air: Evidence for Impact Excitation with Circularly Polarized Light Pulses. <i>Physical Review Letters</i> , 2015, 114, 063003.	2.9	83
38	Superfilamentation in Air. <i>Physical Review Letters</i> , 2014, 112, 223902.	2.9	80
39	Absolute and convective instabilities, front velocities and global modes in nonlinear systems. <i>Physica D: Nonlinear Phenomena</i> , 1997, 108, 236-276.	1.3	77
40	Gas-Induced Solitons. <i>Physical Review Letters</i> , 2001, 86, 1003-1006.	2.9	77
41	Modeling the filamentation of ultra-short pulses in ionizing media. <i>Physics of Plasmas</i> , 2000, 7, 193-209.	0.7	75
42	Spatio-temporal reshaping and X Wave dynamics in optical filaments.. <i>Optics Express</i> , 2007, 15, 13077.	1.7	75
43	Ultrashort laser pulse filamentation from spontaneous X Wave formation in air. <i>Optics Express</i> , 2008, 16, 1565.	1.7	70
44	Propagation of intense ultrashort laser pulses in a plasma filled capillary tube: Simulations and experiments. <i>Physics of Plasmas</i> , 2001, 8, 3445-3456.	0.7	69
45	Self-compression of optical laser pulses by filamentation. <i>New Journal of Physics</i> , 2008, 10, 025023.	1.2	66
46	Generation of long plasma channels in air by focusing ultrashort laser pulses with an axicon. <i>Optics Communications</i> , 2009, 282, 129-134.	1.0	64
47	Focal dynamics of multiple filaments: Microscopic imaging and reconstruction. <i>Physical Review A</i> , 2010, 82, .	1.0	64
48	Tubular filamentation for laser material processing. <i>Scientific Reports</i> , 2015, 5, 8914.	1.6	63
49	Measurement and calculation of nonlinear absorption associated with femtosecond filaments in water. <i>Applied Physics B: Lasers and Optics</i> , 2006, 84, 439-446.	1.1	62
50	Ultrabroadband supercontinuum and third-harmonic generation in bulk solids with two optical-cycle carrier-envelope phase-stable pulses at 2 μ m. <i>Optics Express</i> , 2013, 21, 25210.	1.7	62
51	Filamentation without intensity clamping. <i>Optics Express</i> , 2010, 18, 21504.	1.7	61
52	Steep nonlinear global modes in spatially developing media. <i>Physics of Fluids</i> , 1998, 10, 2433-2435.	1.6	60
53	Femtosecond filamentation in air at low pressures: Part I: Theory and numerical simulations. <i>Optics Communications</i> , 2006, 259, 265-273.	1.0	59
54	From single-cycle self-compressed filaments to isolated attosecond pulses in noble gases. <i>Physical Review A</i> , 2008, 77, .	1.0	59

#	ARTICLE	IF	CITATIONS
55	Backward Lasing of Air plasma pumped by Circularly polarized femtosecond pulses for the sake of remote sensing (BLACK). Optics Express, 2014, 22, 29964.	1.7	59
56	Dynamics of femtosecond filamentation from saturation of self-focusing laser pulses. Physical Review A, 2003, 68, .	1.0	57
57	Single attosecond pulses from high harmonics driven by self-compressed filaments. Optics Letters, 2006, 31, 3662.	1.7	57
58	Femtosecond filamentation and pulse compression in the wake of molecular alignment. Optics Letters, 2008, 33, 2593.	1.7	57
59	Blueshifted continuum peaks from filamentation in the anomalous dispersion regime. Physical Review A, 2013, 87, .	1.0	57
60	Light bullets from femtosecond filamentation. European Physical Journal D, 2003, 27, 159-167.	0.6	56
61	Observation of Conical Waves in Focusing, Dispersive, and Dissipative Kerr Media. Physical Review Letters, 2007, 99, 223902.	2.9	56
62	Efficient generation of third harmonic radiation in air filaments: A revisit. Optics Communications, 2011, 284, 4706-4713.	1.0	55
63	Fully nonlinear global modes in slowly varying flows. Physics of Fluids, 1999, 11, 3688-3703.	1.6	54
64	Femtosecond filamentation in turbulent air. Physical Review A, 2008, 78, .	1.0	53
65	Intensity Spikes in Laser Filamentation: Diagnostics and Application. Physical Review Letters, 2009, 103, 043901.	2.9	52
66	Spectral modulation of femtosecond laser pulse induced by molecular alignment revivals. Optics Letters, 2009, 34, 827.	1.7	52
67	Terahertz pulse emission optimization from tailored femtosecond laser pulse filamentation in air. Optics Letters, 2009, 34, 2165.	1.7	52
68	Propagation of twin laser pulses in air and concatenation of plasma strings produced by femtosecond infrared filaments. Optics Communications, 2003, 225, 177-192.	1.0	51
69	Generation of long-lived underdense channels using femtosecond filamentation in air. Journal of Physics B: Atomic, Molecular and Optical Physics, 2015, 48, 094009.	0.6	51
70	High localization, focal depth and contrast by means of nonlinear Bessel beams. Optics Express, 2005, 13, 6160.	1.7	50
71	From X- to O-shaped spatiotemporal spectra of light filaments in water. Optics Letters, 2005, 30, 3398.	1.7	50
72	Near- and far-field evolution of laser pulse filaments in Kerr media. Physical Review E, 2005, 72, 037601.	0.8	49

#	ARTICLE	IF	CITATIONS
73	Phase matching with pulsed Bessel beams for high-order harmonic generation. <i>Physical Review A</i> , 2008, 77, .	1.0	49
74	Against the wind. <i>Physics of Fluids</i> , 1999, 11, 2977-2983.	1.6	48
75	Near-field dynamics of ultrashort pulsed Bessel beams in media with Kerr nonlinearity. <i>Physical Review E</i> , 2006, 73, 056612.	0.8	48
76	Pattern Selection in the Presence of a Cross Flow. <i>Physical Review Letters</i> , 1997, 79, 2666-2669.	2.9	47
77	Filamentation length of powerful laser pulses. <i>Applied Physics B: Lasers and Optics</i> , 2003, 76, 789-792.	1.1	47
78	High-order harmonic generation directly from a filament. <i>New Journal of Physics</i> , 2011, 13, 043022.	1.2	47
79	Nonlinear light-matter interaction with femtosecond high-angle Bessel beams. <i>Physical Review A</i> , 2012, 85, .	1.0	46
80	Spaceborne laser filamentation for atmospheric remote sensing. <i>Laser and Photonics Reviews</i> , 2016, 10, 481-493.	4.4	45
81	Spectrogram representation of pulse self compression by filamentation. <i>Optics Express</i> , 2008, 16, 17626.	1.7	44
82	Control of femtosecond filamentation by field-free revivals of molecular alignment. <i>Laser Physics</i> , 2009, 19, 1759-1768.	0.6	43
83	Whole life cycle of femtosecond ultraviolet filaments in water. <i>Physical Review A</i> , 2014, 89, .	1.0	43
84	Angular and chromatic dispersion in Kerr-driven conical emission. <i>Optics Communications</i> , 2006, 265, 672-677.	1.0	42
85	Accurate retrieval of pulse-splitting dynamics of a femtosecond filament in water by time-resolved shadowgraphy. <i>Optics Letters</i> , 2009, 34, 3020.	1.7	42
86	Competition between phase-matching and stationarity in Kerr-driven optical pulse filamentation. <i>Physical Review E</i> , 2006, 74, 047603.	0.8	41
87	Nonlinear Bessel vortex beams for applications. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2015, 48, 094006.	0.6	36
88	Carrier-envelope phase-stable spatiotemporal light bullets. <i>Optics Letters</i> , 2015, 40, 3719.	1.7	36
89	Global Instability in Fully Nonlinear Systems. <i>Physical Review Letters</i> , 1996, 77, 4015-4018.	2.9	35
90	Filamentation with nonlinear Bessel vortices. <i>Optics Express</i> , 2014, 22, 25410.	1.7	35

#	ARTICLE	IF	CITATIONS
91	Enhanced harmonic conversion efficiency in the self-guided propagation of femtosecond ultraviolet laser pulses in argon. <i>Applied Physics B: Lasers and Optics</i> , 2005, 80, 211-214.	1.1	34
92	Generation and control of extreme blueshifted continuum peaks in optical Kerr media. <i>Physical Review A</i> , 2008, 78, .	1.0	34
93	Propagation equation for tight-focusing by a parabolic mirror. <i>Optics Express</i> , 2015, 23, 31240.	1.7	33
94	Primary and secondary nonlinear global instability. <i>Physica D: Nonlinear Phenomena</i> , 1999, 132, 428-456.	1.3	32
95	Femtosecond filamentation in air at low pressures. Part II: Laboratory experiments. <i>Optics Communications</i> , 2006, 261, 322-326.	1.0	32
96	Conical-emission and shock-front dynamics in femtosecond laser-pulse filamentation. <i>Physical Review A</i> , 2007, 76, .	1.0	32
97	Stimulated Raman X waves in ultrashort optical pulse filamentation. <i>Optics Letters</i> , 2007, 32, 184.	1.7	31
98	Long spatio-temporally stationary filaments in air using short pulse UV laser Bessel beams. <i>Optics Express</i> , 2009, 17, 5052.	1.7	31
99	Cavitation dynamics and directional microbubble ejection induced by intense femtosecond laser pulses in liquids. <i>Physical Review E</i> , 2012, 86, 036304.	0.8	31
100	Light-filament dynamics and the spatiotemporal instability of the Townes profile. <i>Physical Review A</i> , 2007, 76, .	1.0	30
101	Multi-octave spanning nonlinear interactions induced by femtosecond filamentation in polycrystalline ZnSe. <i>Applied Physics Letters</i> , 2017, 110, .	1.5	30
102	Wavelength tuning of a few-cycle laser pulse by molecular alignment in femtosecond filamentation wake. <i>Physical Review A</i> , 2009, 79, .	1.0	29
103	Optimization of laser energy deposition for single-shot high aspect-ratio microstructuring of thick BK7 glass. <i>Journal of Applied Physics</i> , 2016, 120, .	1.1	28
104	Underwater acoustic wave generation by filamentation of terawatt ultrashort laser pulses. <i>Physical Review E</i> , 2016, 93, 063106.	0.8	27
105	Energy-flux characterization of conical and space-time coupled wave packets. <i>Physical Review A</i> , 2010, 81, .	1.0	26
106	Energy deposition dynamics of femtosecond pulses in water. <i>Applied Physics Letters</i> , 2014, 105, .	1.5	26
107	Second-order cascading-assisted filamentation and controllable supercontinuum generation in birefringent crystals. <i>Optics Express</i> , 2017, 25, 6746.	1.7	26
108	Kerr-induced spontaneous Bessel beam formation in the regime of strong two-photon absorption. <i>Optics Express</i> , 2008, 16, 8213.	1.7	25

#	ARTICLE	IF	CITATIONS
109	Tailoring the filamentation of intense femtosecond laser pulses with periodic lattices. <i>Physical Review A</i> , 2010, 82, .	1.0	25
110	Measurement and Control of Plasma Oscillations in Femtosecond Filaments. <i>Physical Review Letters</i> , 2011, 106, 255002.	2.9	25
111	Effect of input pulse chirp on nonlinear energy deposition and plasma excitation in water. <i>Journal of the Optical Society of America B: Optical Physics</i> , 2014, 31, 2829.	0.9	25
112	Self-reconstructing spatiotemporal light bullets. <i>Optics Express</i> , 2014, 22, 30613.	1.7	25
113	Observation and Optical Tailoring of Photonic Lattice Filaments. <i>Physical Review Letters</i> , 2012, 109, 113905.	2.9	24
114	Nonlinear plasma-assisted collapse of ring-Airy wave packets. <i>Physical Review A</i> , 2016, 93, .	1.0	24
115	Amplification of Femtosecond Laser Filaments in Ti:Sapphire. <i>Physical Review Letters</i> , 2005, 95, 163901.	2.9	23
116	Few-cycle shock X -wave generation by filamentation in prealigned molecules. <i>Physical Review A</i> , 2009, 80, .	1.0	23
117	Ciliary White Light: Optical Aspect of Ultrashort Laser Ablation on Transparent Dielectrics. <i>Physical Review Letters</i> , 2013, 110, 097601.	2.9	23
118	Third- and fifth-harmonic generation in transparent solids with few-optical-cycle midinfrared pulses. <i>Physical Review A</i> , 2014, 89, .	1.0	23
119	Pulse shortening, spatial mode cleaning, and intense terahertz generation by filamentation in xenon. <i>Physical Review A</i> , 2007, 76, .	1.0	22
120	Experimental energy-density flux characterization of ultrashort laser pulse filaments. <i>Optics Express</i> , 2009, 17, 8193.	1.7	22
121	Invited Article: Filamentary deposition of laser energy in glasses with Bessel beams. <i>APL Photonics</i> , 2018, 3, 120805.	3.0	21
122	Ultrafast Supercontinuum Generation in Transparent Solid-State Media. <i>SpringerBriefs in Physics</i> , 2019, .	0.2	21
123	A simple method for determination of nonlinear propagation regimes in gases. <i>Optics Express</i> , 2007, 15, 15260.	1.7	20
124	Tracking spectral shapes and temporal dynamics along a femtosecond filament. <i>Optics Express</i> , 2011, 19, 19495.	1.7	17
125	Odd harmonics-enhanced supercontinuum in bulk solid-state dielectric medium. <i>Optics Express</i> , 2016, 24, 17060.	1.7	17
126	Few-cycle laser-pulse collapse in Kerr media: The role of group-velocity dispersion and X -wave formation. <i>Physical Review A</i> , 2008, 78, .	1.0	16

#	ARTICLE	IF	CITATIONS
127	Controlling high-power autofocusing waves with periodic lattices. <i>Optics Letters</i> , 2014, 39, 4958.	1.7	16
128	Light trajectory in Bessel-Gauss vortex beams. <i>Journal of the Optical Society of America A: Optics and Image Science, and Vision</i> , 2015, 32, 1313.	0.8	15
129	Postfilament supercontinuum on 100-m path in air. <i>Optics Letters</i> , 2021, 46, 1125.	1.7	15
130	Propagating Pattern Selection and Causality Reconsidered. <i>Physical Review Letters</i> , 2000, 84, 1910-1913.	2.9	14
131	Tailoring femtosecond laser pulse filamentation using plasma photonic lattices. <i>Applied Physics Letters</i> , 2013, 103, .	1.5	14
132	Compression of ultrashort laser pulses in planar hollow waveguides: a stability Analysis. <i>Optics Express</i> , 2009, 17, 11122.	1.7	13
133	Efficient second-harmonic generation of a high-energy, femtosecond laser pulse in a lithium triborate crystal. <i>Optics Letters</i> , 2021, 46, 3540.	1.7	13
134	Remote triggering of air-gap discharge by a femtosecond laser filament and postfilament at distances up to 80 m. <i>Applied Physics Letters</i> , 2021, 119, .	1.5	13
135	Pushed global modes in weakly inhomogeneous subcritical flows. <i>Physica D: Nonlinear Phenomena</i> , 2001, 158, 129-150.	1.3	12
136	Spontaneous emergence of pulses with constant carrier-envelope phase in femtosecond filamentation. <i>Optics Express</i> , 2008, 16, 11103.	1.7	12
137	Intense dynamic bullets in a periodic lattice. <i>Optics Express</i> , 2011, 19, 10057.	1.7	12
138	Space-time focusing of Bessel-like pulses. <i>Optics Letters</i> , 2010, 35, 3267.	1.7	11
139	On the Role of Conical Waves in Self-focusing and Filamentation of Femtosecond Pulses with Nonlinear Losses. <i>Topics in Applied Physics</i> , 2009, , 457-479.	0.4	11
140	Laser beam self-symmetrization in air in the multifilamentation regime. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2015, 48, 094013.	0.6	10
141	Absolute and convective nature of the modulational and Raman instabilities in the relativistic regime. <i>Physics of Plasmas</i> , 2001, 8, 3434-3442.	0.7	9
142	Plasma absorption evidence via chirped pulse spectral transmission measurements. <i>Applied Physics Letters</i> , 2015, 106, 231101.	1.5	9
143	Determination of molecular contributions to the nonlinear refractive index of air for mid-infrared femtosecond laser-pulse excitation. <i>Physical Review A</i> , 2019, 99, .	1.0	9
144	Phase- and group-matched nonlinear interactions mediated by multiple filamentation in Kerr media. <i>Physical Review A</i> , 2007, 76, .	1.0	8

#	ARTICLE	IF	CITATIONS
145	Tight focusing of electromagnetic fields by large-aperture mirrors. <i>Physical Review E</i> , 2019, 100, 033316.	0.8	8
146	Third-harmonic generation from regularized converging filaments. <i>Journal of the Optical Society of America B: Optical Physics</i> , 2019, 36, A66.	0.9	7
147	Absolute and convective nature of Raman instability in relativistic hot plasmas. <i>Physics of Plasmas</i> , 2004, 11, 4814-4823.	0.7	6
148	DNA Base Modifications Mediated by Femtosecond Laser-Induced Cold Low-Density Plasma in Aqueous Solutions. <i>Journal of Physical Chemistry Letters</i> , 2019, 10, 2753-2760.	2.1	6
149	Self-focusing and Filamentation of Femtosecond Pulses in Air and Condensed Matter: Simulations and Experiments. <i>Topics in Applied Physics</i> , 2009, , 297-322.	0.4	6
150	Analysis of the angular spectrum for ultrashort laser pulses. <i>Journal of the Optical Society of America B: Optical Physics</i> , 2019, 36, A105.	0.9	6
151	Control of the acoustic waves generated by intense laser filamentation in water. <i>Optics Express</i> , 2022, 30, 9103.	1.7	6
152	Trajectory interferences in a semi-infinite gas cell. <i>Laser Physics Letters</i> , 2012, 9, 207-211.	0.6	5
153	Generation of high harmonics and attosecond pulses with ultrashort laser pulse filaments and conical waves. <i>Pramana - Journal of Physics</i> , 2014, 83, 221-230.	0.9	5
154	Cell viability and shock wave amplitudes in the endothelium of porcine cornea exposed to ultrashort laser pulses. <i>Graefe's Archive for Clinical and Experimental Ophthalmology</i> , 2017, 255, 945-953.	1.0	5
155	Femtosecond Filamentation in Air. <i>Springer Series in Chemical Physics</i> , 2006, , 235-258.	0.2	4
156	Long plasma channels formed by axicon-focused filaments. <i>Proceedings of SPIE</i> , 2008, , .	0.8	4
157	Carrier-envelope shearing and isolated attosecond pulse generation. <i>Physical Review A</i> , 2011, 83, .	1.0	4
158	Phase-Insensitive Scattering of Terahertz Radiation. <i>Photonics</i> , 2017, 4, 7.	0.9	4
159	Nonlinear propagation and filamentation of intense Airy beams in transparent media. <i>Proceedings of SPIE</i> , 2012, , .	0.8	3
160	Filamentation and Pulse Self-compression in the Anomalous Dispersion Region of Glasses. , 2016, , 147-165.		3
161	In-line Spectral Interferometry in Shortwave-Infrared Laser Filaments in Air. <i>Physical Review Letters</i> , 2019, 123, 223203.	2.9	3
162	Tracing Evolution of Angle-Wavelength Spectrum along the 40-m Postfilament in Corridor Air. <i>Photonics</i> , 2021, 8, 446.	0.9	3

#	ARTICLE	IF	CITATIONS
163	Linear X-wave generation by means of cross-phase modulation in Kerr media. Optics Letters, 2008, 33, 3028.	1.7	2
164	A Waveguide Made of Hot Air. Physics Magazine, 2014, 7, .	0.1	2
165	Investigation of supersonic heat-conductivity hyperbolic waves in radiative ablation flows. Physical Review E, 2020, 101, 043215.	0.8	2
166	4D spatio-temporal electric field characterization of ultrashort light pulses undergoing filamentation. Optics Express, 2022, 30, 27938.	1.7	2
167	Focusing of ultrashort sub-TW laser pulses in air: supercontinuum emission. , 2010, , .		1
168	Propagation of intense femtosecond laser pulse in water and acoustic waves generation. , 2014, , .		1
169	Stability of ablation flows in inertial confinement fusion: Nonmodal effects. Physical Review E, 2021, 103, 023211.	0.8	1
170	Acoustic wave generation by multifilamentation in water. , 2016, , .		1
171	Deterministic multiple filamentation in air: Theory. , 2004, , IThG34.		0
172	Generation of long plasma channels in air by using axicon-generated bessel beams. , 2008, , .		0
173	Near-infrared optical parametric amplification in a gas-filled hollow fibre. , 2009, , .		0
174	Energy up-scalable ultrashort pulse compression using planar hollow waveguides. , 2009, , .		0
175	Physical characterization of light-plasma filaments in water using time resolved shadowgraphy. , 2009, , .		0
176	Compression of High Energy Ultrashort Laser Pulses in Hollow Planar Waveguides. , 2009, , .		0
177	Tunable, octave-spanning supercontinuum driven by X-Waves formation in condensed Kerr media.. Springer Series in Chemical Physics, 2009, , 858-860.	0.2	0
178	Energy density characterization of complex ultrashort laser pulses. , 2010, , .		0
179	3-octave high-energy supercontinuum from visible to mid-IR. , 2011, , .		0
180	Efficient third harmonic generation by two crossing filaments. , 2011, , .		0

#	ARTICLE	IF	CITATIONS
181	Towards few-cycle pulses with relativistic intensities, using pulse compression in planar waveguides. , 2011, , .		0
182	3-octave high-energy supercontinuum from a 2 µm source. , 2011, , .		0
183	Towards light-matter interaction at extreme intensities using high-angle Bessel beams. , 2012, , .		0
184	Multi-octave supercontinuum from bulk filamentation of a mid-IR pulse. , 2012, , .		0
185	Enhanced Detection of Broadband Terahertz Fields via the Filamentation of Chirped Optical Pulses. , 2012, , .		0
186	Probing Femtosecond Filamentation via High-order Harmonics. , 2012, , .		0
187	Dynamics of third harmonic yield from a femtosecond laser filament in air. , 2013, , .		0
188	Ciliary white light generated during femtosecond laser ablation on transparent dielectrics. , 2013, , .		0
189	Multi-octave supercontinuum generation from mid-infrared filamentation in a bulk crystal. EPJ Web of Conferences, 2013, 41, 10010.	0.1	0
190	Nonlinear energy deposition in water from fs-laser pulses: effect of the input chirp. , 2014, , .		0
191	Third and fifth harmonic generation in transparent solids with few optical cycle mid-infrared pulses. , 2014, , .		0
192	Imaging Ultrafast Light-Matter Interaction with Inverse Raman Scattering. , 2014, , .		0
193	Spatiotemporal Light Bullets in Bulk Media. , 2014, , .		0
194	Nonlinear optical phenomena in bulk dielectric media with few optical cycle mid-IR pulses. , 2014, , .		0
195	Resonant Radiation from Collapsing Light Pulses and Spatiotemporal Light Bullets. , 2014, , .		0
196	Optical Aspect of Ultrafast Laser Ablation on Transparent Dielectrics: Ciliary White Light. , 2015, , .		0
197	Imaging of bessel filaments in fused silica and impact on modelling the underlying light-matter physics. , 2016, , .		0
198	Femtosecond Filamentation in Solid-State Media. SpringerBriefs in Physics, 2019, , 27-46.	0.2	0

#	ARTICLE	IF	CITATIONS
199	Experimental Results. SpringerBriefs in Physics, 2019, , 65-94.	0.2	0
200	Governing Physical Effects. SpringerBriefs in Physics, 2019, , 9-26.	0.2	0
201	General Practical Considerations. SpringerBriefs in Physics, 2019, , 49-63.	0.2	0
202	Self-guided propagation of fs UV laser pulses and efficient harmonic generation in low pressure Argon. , 2004, , .		0
203	Long range horizontal propagation of femtosecond self-channelled laser pulses in air. , 2004, , .		0
204	Deterministic multi-filamentation in air: Experimental. , 2004, , .		0
205	Conical Waves in the Frontier between Linear, Nonlinear and Quantum Optics. , 2005, , .		0
206	Nonlinear light propagation in air. , 2005, , .		0
207	5.1 fs pulses by filamentation â€œ prospective of CEO-preserving self-compression to one optical cycle. , 2006, , .		0
208	Shocked-X-Wave Dynamics in Fs Laser Pulse Filamentation. , 2006, , .		0
209	Rotational quantum wake of pre-aligned molecules for femtosecond filamentation. , 2009, , .		0
210	Optical Parametric Amplification in the NIR in a gaseous medium by use of a hollow fibre. , 2009, , .		0
211	Spontaneous currents inside air filaments. , 2011, , .		0
212	Measurement and control of electric currents in Ar and N2 filaments. , 2011, , .		0
213	Angle-frequency analysis of high-order harmonic generation. , 2011, , .		0
214	Femtosecond laser pulse control of collapsing bubble jets and bubble ejection streams. , 2012, , .		0
215	Terahertz Field Detection Boost by Nonlinear Collapse of Normally Dispersed Optical Pulses. , 2012, , .		0
216	Materials processing using abruptly autofocusing beams. , 2013, , .		0

#	ARTICLE	IF	CITATIONS
217	High Average Power Few-Cycle Pulses in the Mid-IR, Self-Compression and Continuum Generation. , 2013, , .		0
218	Influence of the anomalous dispersion on the supercontinuum generation by femtosecond laser filamentation. , 2013, , .		0
219	A Scaling Mechanism for Increasing the Terahertz Emission from Ionization of Air. , 2013, , .		0
220	Blueshifted Continuum Peaks from Filamentation in the Anomalous Dispersion Regime. , 2013, , .		0
221	Third Harmonic Generation from Perturbed Femtosecond Filaments in Air. Springer Series in Chemical Physics, 2014, , 77-93.	0.2	0
222	Study of the interaction between multiple filaments in air. , 2014, , .		0
223	Guiding Discharges along Curved Paths. , 2015, , .		0
224	Laser Guided Curved Electric Discharges. , 2015, , .		0
225	Backward Lasing of Femtosecond Plasma Filaments. Springer Series in Chemical Physics, 2015, , 89-103.	0.2	0
226	Enhanced absorption and plasmon excitation in the bulk of fused silica with femtosecond Bessel beams. , 2016, , .		0
227	Measurements of fluence profiles in femtosecond laser sparks and superfilaments in air. Physical Review A, 2018, 97, .	1.0	0
228	Spectral and intensity control of high energy terahertz radiation from bulk liquids. Journal Physics D: Applied Physics, 2022, 55, 095107.	1.3	0
229	Post-compression of high average power picosecond pulses for few cycle generation and FEL pump-probe experiments. EPJ Web of Conferences, 2020, 243, 21002.	0.1	0