Emmanuel Marin

List of Publications by Year
in descending order

65 papers	816 citations	15 h-index (567144)	26 g-index (552653)
65 all docs	65 docs citations	65 times ranked	466 citing authors

#	Article	IF	Citations
1	Photobleaching Effect on the Radiationâ€Induced Attenuation of an Ultralow Loss Optical Fiber at Telecommunication Wavelengths. Physica Status Solidi (A) Applications and Materials Science, 2022, 219, 2100518.	0.8	6
2	Pulsed Xâ€Ray Radiation Response of Ultralow Loss Pureâ€Silicaâ€Core Optical Fibers. Physica Status Solidi (A) Applications and Materials Science, 2022, 219, 2100519.	0.8	3
3	Temperature Dependence of Low-Dose Radiation-Induced Attenuation of Germanium-Doped Optical Fiber at Infrared Wavelengths. IEEE Transactions on Nuclear Science, 2022, 69, 512-517.	1.2	9
4	Multiphoton process investigation in silica by UV femtosecond laser. Journal of Non-Crystalline Solids, 2022, 580, 121384.	1.5	4
5	Optimization of the Radiation Response of Backup Optical Fiber Amplifiers for Space Missions. IEEE Transactions on Nuclear Science, 2022, 69, 1500-1505.	1.2	0
6	X-Ray Radioluminescence in Diversely Doped Multimode Silica-Based Optical Fibers. IEEE Transactions on Nuclear Science, 2022, 69, 1625-1632.	1.2	3
7	Temperature Dependence of Radiation Induced Attenuation of Aluminosilicate Optical Fiber. IEEE Transactions on Nuclear Science, 2022, 69, 1515-1520.	1.2	4
8	Photocycle of point defects in highly- and weakly-germanium doped silica revealed by transient absorption measurements with femtosecond tunable pump. Scientific Reports, 2022, 12, .	1.6	1
9	Transient absorption with a femtosecond tunable excitation pump reveals the emission kinetics of color centers in amorphous silica. Optics Letters, 2021, 46, 1736.	1.7	1
10	Photoluminescence of Point Defects in Silicon Dioxide by Femtosecond Laser Exposure. Physica Status Solidi (A) Applications and Materials Science, 2021, 218, 2000802.	0.8	2
11	Temperature Influence on the Radiation Responses of Erbiumâ€Doped Fiber Amplifiers. Physica Status Solidi (A) Applications and Materials Science, 2021, 218, 2100002.	0.8	8
12	Operating Temperature Range of Phosphorous-Doped Optical Fiber Dosimeters Exploiting Infrared Radiation-Induced Attenuation. IEEE Transactions on Nuclear Science, 2021, 68, 906-912.	1.2	12
13	Combined Temperature and Radiation Effects on the Gain of Er- and Erâ€“Yb-Doped Fiber Amplifiers. IEEE Transactions on Nuclear Science, 2021, 68, 793-800.	1.2	8
14	Regeneration of Fiber Bragg Gratings and Their Responses Under X-Rays. IEEE Transactions on Nuclear Science, 2021, 68, 1681-1687.	1.2	4
15	Distributed Temperature and Strain Fiber-Based Sensing in Radiation Environment. IEEE Transactions on Nuclear Science, 2021, 68, 1675-1680.	1.2	2
16	Photobleaching Effect on Infrared Radiation-Induced Attenuation of Germanosilicate Optical Fibers at MGy Dose Levels. IEEE Transactions on Nuclear Science, 2021, 68, 1688-1693.	1.2	9
17	Temperature Effect on the Radioluminescence of Cu-, Ce-, and CuCe-Doped Silica-Based Fiber Materials. IEEE Transactions on Nuclear Science, 2021, 68, 1782-1787.	1.2	5
18	All-Fiber Magneto-Optical Effect Using Nanoparticles Doped Sol-Gel Thin Film Deposited Within Microstructured Fibers. Journal of Lightwave Technology, 2021, 39, 5604-5610.	2.7	4

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19	Structural and optical changes in silica-based optical fibers exposed to high neutron and gamma fluences. Journal of Non-Crystalline Solids, 2021, 574, 121150.	1.5	1
20	Recent Advances in Radiation-Hardened Fiber-Optic Amplifiers for Space-based Laser Communications. , 2021, , .		0
21	Optimization of single-mode optical fibers for strain and temperature discrimination through Brillouin sensing. , 2021, , .		0
22	Transient and Steady-State Radiation Response of Phosphosilicate Optical Fibers: Influence of H₂ Loading. IEEE Transactions on Nuclear Science, 2020, 67, 289-295.	1.2	7
23	Performances of Radiation-Hardened Single-Ended Raman Distributed Temperature Sensors Using Commercially Available Fibers. IEEE Transactions on Nuclear Science, 2020, 67, 305-311.	1.2	10
24	Radiation Effects on WDM and DWDM Architectures of Preamplifier and Boost-Amplifier. IEEE Transactions on Nuclear Science, 2020, 67, 278-283.	1.2	2
25	Origins of radiation-induced attenuation in pure-silica-core and Ge-doped optical fibers under pulsed x-ray irradiation. Journal of Applied Physics, 2020, 128, .	1.1	17
26	Atmospheric Neutron Monitoring through Optical Fiber-Based Sensing. Sensors, 2020, 20, 4510.	2.1	9
27	Comparison between the UV and X-ray Photosensitivities of Hybrid TiO2-SiO2 Thin Layers. Materials, 2020, 13, 3730.	1.3	3
28	Extreme Radiation Sensitivity of Ultra-Low Loss Pure-Silica-Core Optical Fibers at Low Dose Levels and Infrared Wavelengths. Sensors, 2020, 20, 7254.	2.1	17
29	Radiation-Response of Fiber Bragg Gratings at Low Temperatures. IEEE Transactions on Nuclear Science, 2020, 67, 1637-1642.	1.2	5
30	Combined Temperature and Radiation Effects on Radiation-Sensitive Single-Mode Optical Fibers. IEEE Transactions on Nuclear Science, 2020, 67, 1643-1649.	1.2	16
31	Radiation Response of Distributed Feedback Bragg Gratings for Space Applications. IEEE Transactions on Nuclear Science, 2020, 67, 284-288.	1.2	2
32	Coupled radiation and temperature effects on Erbium-doped fiber amplifiers. , 2020, , .		1
33	Combined Experimental and Simulation Study of the Fiber Composition Effects on Its Brillouin Scattering Signature. Journal of Lightwave Technology, 2019, 37, 4619-4624.	2.7	4
34	Numerical and Experimental Study on the IR Femtosecond Laser and Phase Mask-Based Grating Inscription in Photonic Crystal Fibers. , 2019, , .		0
35	Radiation and High Temperature Effects on Regenerated Fiber Bragg Grating. Journal of Lightwave Technology, 2019, 37, 4763-4769.	2.7	8
36	Distributed Optical Fiber Sensor Allowing Temperature and Strain Discrimination in Radiation Environments. IEEE Transactions on Nuclear Science, 2019, 66, 1651-1656.	1.2	6

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37	Radiation-Induced Effects on Fiber Bragg Gratings Inscribed in Highly Birefringent Photonic Crystal Fiber. IEEE Transactions on Nuclear Science, 2019, 66, 120-124.	1.2	3
38	Theoretical Investigation of Thermal Effects in High Power Er 3+ /Yb 3+ â€•Codoped Doubleâ€Clad Fiber Amplifiers for Space Applications. Physica Status Solidi (A) Applications and Materials Science, 2019, 216, 1800582.	0.8	5
39	X-Rays, <inline-formula> <tex-math notation="LaTeX">$gamma$ </tex-math> </inline-formula>-Rays, and Proton Beam Monitoring With Multimode Nitrogen-Doped Optical Fiber. IEEE Transactions on Nuclear Science, 2019, 66, 306-311.	1.2	11
40	X-ray preconditioning for enhancing refractive index contrast in femtosecond laser photoinscription of embedded waveguides in pure silica. Optical Materials Express, 2019, 9, 65.	1.6	13
41	Near-IR- and UV-femtosecond laser waveguide inscription in silica glasses. Optical Materials Express, 2019, 9, 4624.	1.6	15
42	Steady-State Radiation-Induced Effects on the Performances of BOTDA and BOTDR Optical Fiber Sensors. IEEE Transactions on Nuclear Science, 2018, 65, 111-118.	1.2	14
43	Radiation Effects on Type I Fiber Bragg Gratings: Influence of Recoating and Irradiation Conditions. Journal of Lightwave Technology, 2018, 36, 998-1004.	2.7	11
44	X-Ray, Proton, and Electron Radiation Effects on Type I Fiber Bragg Gratings. IEEE Transactions on Nuclear Science, 2018, 65, 1632-1638.	1.2	12
45	6-MeV Electron Exposure Effects on OFDR-Based Distributed Fiber-Based Sensors. IEEE Transactions on Nuclear Science, 2018, 65, 1598-1603.	1.2	8
46	Dependence of the Voids-Fiber Bragg Grating Radiation Response on Temperature, Dose, and Dose Rate. IEEE Transactions on Nuclear Science, 2018, 65, 1619-1623.	1.2	9
47	Study of Fiber Bragg Grating Samples Exposed to High Fast Neutron Fluences. IEEE Transactions on Nuclear Science, 2018, 65, 2494-2501.	1.2	17
48	Validity of the McCumber Theory at High Temperatures in Erbium and Ytterbium-Doped Aluminosilicate Fibers. IEEE Journal of Quantum Electronics, 2018, 54, 1-7.	1.0	5
49	IR femtosecond pulsed laser-based fiber Bragg grating inscription in a photonic crystal fiber using a phase mask and a short focal length lens. Optics Express, 2018, 26, 14741.	1.7	6
50	Radiation hardened high-power Er³⁺/Yb³⁺-codoped fiber amplifiers for free-space optical communications. Optics Letters, 2018, 43, 3049.	1.7	25
51	Recent advances in radiation-hardened fiber-based technologies for space applications. Journal of Optics (United Kingdom), 2018, 20, 093001.	1.0	153
52	Regenerated Fiber Bragg Gratings under High Temperature and Radiations. , 2018, , .		3
53	Combined Radiations and Temperature Effects on FBGs Photo-inscribed by Femtosecond Laser in Radiation-Hardened Optical Fibers. , 2018, , .		2
54	Gamma Radiation Tests of Radiation-Hardened Fiber Bragg Grating-Based Sensors for Radiation Environments. IEEE Transactions on Nuclear Science, 2017, 64, 2307-2311.	1.2	14

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55	A thermomechanical sensor using photo-inscribed volume Bragg gratings. Tribology International, 2017, 115, 417-423.	3.0	7
56	Radiation-Hardened Fiber Bragg Grating Based Sensors for Harsh Environments. IEEE Transactions on Nuclear Science, 2017, 64, 68-73.	1.2	27
57	Franceâ€™s State of the Art Distributed Optical Fibre Sensors Qualified for the Monitoring of the French Underground Repository for High Level and Intermediate Level Long Lived Radioactive Wastes. Sensors, 2017, 17, 1377.	2.1	33
58	Compaction in Optical Fibres and Fibre Bragg Gratings Under Nuclear Reactor High Neutron and Gamma Fluence. IEEE Transactions on Nuclear Science, 2016, 63, 2317-2322.	1.2	50
59	Radiation Characterization of Optical Frequency Domain Reflectometry Fiber-Based Distributed Sensors. IEEE Transactions on Nuclear Science, 2016, 63, 1688-1693.	1.2	15
60	Dose Rate Effect Comparison on the Radiation Response of Type I Fiber Bragg Gratings Written With UV cw Laser. IEEE Transactions on Nuclear Science, 2016, 63, 2046-2050.	1.2	8
61	Radiation effects on optical frequency domain reflectometry fiber-based sensor. Optics Letters, 2015, 40, 4571.	1.7	30
62	Radiation Vulnerability of Fiber Bragg Gratings in Harsh Environments. Journal of Lightwave Technology, 2015, 33, 2646-2651.	2.7	22
63	Influence of photo-inscription conditions on the radiation-response of fiber Bragg gratings. Optics Express, 2015, 23, 8659.	1.7	18
64	Vulnerability of OFDR-based distributed sensors to high Î³-ray doses. Optics Express, 2015, 23, 18997.	1.7	33
65	Radiation tolerant fiber Bragg gratings for high temperature monitoring at MGy dose levels. Optics Letters, 2014, 39, 5313.	1.7	54