Paolo Russo

List of Publications by Year
in descending order

90 papers	1,238 citations	361296 20 h-index	454834 30 g-index
92 all docs	92 docs citations	92 times ranked	897 citing authors

#	Article	IF	Citations
1	Breast radiotherapy with kilovoltage photons and gold nanoparticles as radiosensitizer: An in vitro study. Medical Physics, 2022, 49, 568-578.	1.6	12
2	Virtual Clinical Trials in 2D and 3D X-ray Breast Imaging and Dosimetry: Comparison of CPU-Based and GPU-Based Monte Carlo Codes. Cancers, 2022, 14, 1027.	1.7	9
3	Comparisons of glandular breast dose between digital mammography, tomosynthesis and breast CT based on anthropomorphic patient-derived breast phantoms. Physica Medica, 2022, 97, 50-58.	0.4	8
4	Fabrication of 3D printed patient-derived anthropomorphic breast phantoms for mammography and digital breast tomosynthesis: Imaging assessment with clinical X-ray spectra. Physica Medica, 2022, 98, 88-97.	0.4	9
5	In-Line Phase Contrast Mammography, Phase Contrast Digital Breast Tomosynthesis, and Phase Contrast Breast Computed Tomography With a Dedicated CT Scanner and a Microfocus X-Ray Tube: Experimental Phantom Study. IEEE Transactions on Radiation and Plasma Medical Sciences, 2021, 5, 793-806.	2.7	6
6	Normalized glandular dose coefficients for digital breast tomosynthesis systems with a homogeneous breast model. Physics in Medicine and Biology, 2021, 66, 065024.	1.6	8
7	Dataset of patientâ€derived digital breast phantoms for in silico studies in breast computed tomography, digital breast tomosynthesis, and digital mammography. Medical Physics, 2021, 48, 2682-2693.	1.6	26
8	The scientific publications of AIFM members in 2015â€“2019: A survey of the FutuRuS working group. Physica Medica, 2021, 88, 111-116.	0.4	1
9	Radiomics software for breast imaging optimization and simulation studies. Physica Medica, 2021, 89, 114-128.	0.4	5
10	CdTe compact gamma camera for coded aperture imaging in radioguided surgery. Physica Medica, 2020, 69, 223-232.	0.4	14
11	Mammography dose estimates do not reflect any specific patient's breast dose. European Journal of Radiology, 2020, 131, 109216.	1.2	2
12	Radiochromic film dosimetry in synchrotron radiation breast computed tomography: a phantom study. Journal of Synchrotron Radiation, 2020, 27, 762-771.	1.0	5
13	Virtual clinical trials in 3D and 2D breast imaging with digital phantoms derived from clinical breast CT scans. , 2020, , .		6
14	Advanced Monte Carlo application for in-silico clinical trials in x-ray breast imaging. , 2020, , .		6
15	Development of breast lesions models database. Physica Medica, 2019, 64, 293-303.	0.4	24
16	BriXs Ultra High Flux Inverse Compton Source Based on Modified Push-Pull Energy Recovery Linacs. Instruments, 2019, 3, 49.	0.8	15
17	Models of breast lesions based on three-dimensional X-ray breast images. Physica Medica, 2019, 57, 80-87.	0.4	21
18	Monte Carlo calculation of monoenergetic and polyenergetic DgN coefficients for mean glandular dose estimates in mammography using a homogeneous breast model. Physics in Medicine and Biology, 2019, 64, 125012.	1.6	13

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19	The Napoli-Varna-Davis project for virtual clinical trials in X-ray breast imaging. , 2019, , .		8
20	Manufacturing of physical breast phantoms with 3D printing technology for X-ray breast imaging. , 2019, , .		6
21	Advancements towards the implementation of clinical phase-contrast breast computed tomography at Elettra. Journal of Synchrotron Radiation, 2019, 26, 1343-1353.	1.0	47
22	CHARACTERIZATION OF A SMALL FOV PORTABLE GC: MediPROBE. Radiation Protection Dosimetry, 2019, 183, 290-296.	0.4	2
23	The European Federation of Organisations for Medical Physics (EFOMP) White Paper: Big data and deep learning in medical imaging and in relation to medical physics profession. Physica Medica, 2018, 56, 90-93.	0.4	36
24	[P194] Breast cancer radiosurgery with a synchrotron radiation beam. Physica Medica, 2018, 52, 156.	0.4	0
25	Suitability of low density materials for 3D printing of physical breast phantoms. Physics in Medicine and Biology, 2018, 63, 175020.	1.6	57
26	Synchrotron radiation external beam rotational radiotherapy of breast cancer: proof of principle. Journal of Synchrotron Radiation, 2018, 25, 857-868.	1.0	9
27	[OA192] Kilovoltage rotational radiotheraphy with the marix/brixs source for partial breast irradiation. Physica Medica, 2018, 52, 74.	0.4	2
28	Monte Carlo evaluation of glandular dose in cone-beam X-ray computed tomography dedicated to the breast: Homogeneous and heterogeneous breast models. Physica Medica, 2018, 51, 99-107.	0.4	21
29	Doseâ€“response of EBT3 radiochromic films to proton and carbon ion clinical beams. Physics in Medicine and Biology, 2017, 62, 377-393.	1.6	61
30	Evaluation of Dose Homogeneity in Cone-Beam Breast Computed Tomography. Radiation Protection Dosimetry, 2017, 175, 473-481.	0.4	4
31	Air kerma calculation in Monte Carlo simulations for deriving normalized glandular dose coefficients in mammography. Physics in Medicine and Biology, 2017, 62, N337-N349.	1.6	17
32	Evaluation of a breast software model for 2D and 3D X-ray imaging studies of the breast. Physica Medica, 2017, 41, 78-86.	0.4	19
33	A Monte Carlo model for mean glandular dose evaluation in spot compression mammography. Medical Physics, 2017, 44, 3848-3860.	1.6	24
34	A Monte Carlo study of monoenergetic and polyenergetic normalized glandular dose (DgN) coefficients in mammography. Physics in Medicine and Biology, 2017, 62, 306-325.	1.6	38
35	Towards breast cancer rotational radiotherapy with synchrotron radiation. Physica Medica, 2017, 41, 20-25.	0.4	15
36	Dose Volume Distribution in Digital Breast Tomosynthesis: A Phantom Study. IEEE Transactions on Radiation and Plasma Medical Sciences, 2017, 1, 322-328.	2.7	15

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37	Volume dose distribution in digital breast tomosynthesis: A phantom study. , 2016, , .		0
38	Performance of the mediPROBE compact gamma camera for coded aperture imaging. , 2016, , .		3
39	Cone-beam micro computed tomography dedicated to the breast. Medical Engineering and Physics, 2016, 38, 1449-1457.	0.8	30
40	Survival fraction and phenotype alterations of Xenopus laevis embryos at 3ÂGy, 150ÂkV X-ray irradiation. Biochemical and Biophysical Research Communications, 2016, 480, 580-585.	1.0	8
41	In-line phase contrast tomography of the breast with a dedicated micro-CT scanner. , 2016, , .		2
42	Combined SPECT/CT and PET/CT for breast imaging. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2016, 809, 58-66.	0.7	14
43	Evaluation of the BreastSimulator Software Platform for Breast Tomography: Preliminary Results. Lecture Notes in Computer Science, 2016, , 145-151.	1.0	4
44	Monte Carlo Evaluation of Normalized Glandular Dose Coefficients in Mammography. Lecture Notes in Computer Science, 2016, , 190-196.	1.0	9
45	Contrast Detail Phantoms for X-ray Phase-Contrast Mammography and Tomography. Lecture Notes in Computer Science, 2016, , 611-617.	1.0	5
46	Image Quality and Radiation Dose in Propagation Based Phase Contrast Mammography with a Microfocus X-ray Tube: A Phantom Study. Lecture Notes in Computer Science, 2016, , 618-624.	1.0	5
47	Dedicated breast computed tomography: Basic aspects. Medical Physics, 2015, 42, 2786-2804.	1.6	106
48	Solid-State Detectors for Small-Animal Imaging. , 2014, , 23-82.		5
49	New Editor-in-Chief. Physica Medica, 2013, 29, 1-2.	0.4	1
50	Investigation of the dose distribution for a cone beam CT system dedicated to breast imaging. Physica Medica, 2013, 29, 379-387.	0.4	13
51	Signal-to-Noise Gain at Variable Randoms Ratio in TOF PET. IEEE Transactions on Nuclear Science, 2012, 59, 1948-1957.	1.2	9
52	Coneâ€beam breast computed tomography with a displaced flat panel detector array. Medical Physics, 2012, 39, 2805-2819.	1.6	22
53	Measurement of the MTF of a Cone-Beam Breast Computed Tomography Laboratory Scanner. IEEE Transactions on Nuclear Science, 2011, 58, 703-713.	1.2	20
54	Method for measuring the focal spot size of an xâ€ray tube using a coded aperture mask and a digital detector. Medical Physics, 2011, 38, 2099-2115.	1.6	25

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55	Evaluation of a CdTe semiconductor based compact gamma camera for sentinel lymph node imaging. Medical Physics, 2011, 38, 1547-1560.	1.6	24
56	Dedicated scanner for laboratory investigations on cone-beam CT/SPECT imaging of the breast. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2011, 629, 350-356.	0.7	35
57	High Resolution ^{125}I Pinhole SPECT Imaging of the Mouse Thyroid With the MediSPECT Small Animal CdTe Scanner. IEEE Transactions on Nuclear Science, 2010, 57, 1029-1037.	1.2	5
58	Dose Distribution in Cone-Beam Breast Computed Tomography: An Experimental Phantom Study. IEEE Transactions on Nuclear Science, 2010, 57, 366-374.	1.2	15
59	Distribution of Absorbed Dose in Cone-Beam Breast Computed Tomography: A Phantom Study With Radiochromic Films. IEEE Transactions on Nuclear Science, 2010, 57, 2220-2229.	1.2	8
60	X-ray Cone-Beam Breast Computed Tomography: Phantom Studies. IEEE Transactions on Nuclear Science, 2010, 57, 160-172.	1.2	27
61	Evaluation of Scattering in Cone-Beam Breast Computed Tomography: A Monte Carlo and Experimental Phantom Study. IEEE Transactions on Nuclear Science, 2010, 57, 2510-2517.	1.2	12
62	X-ray cone-beam breast computed tomography: Phantoms studies on microcalcifications Visibility. , 2009, , .		0
63	Evaluation of scattering in cone-beam breast computed tomography: A Monte Carlo and experimental phantom study. , 2009, , .		1
64	Measurement of the MTF of a Cone-Beam Breast Computed Tomography laboratory scanner. , 2009, , .		3
65	Distribution of absorbed dose in cone-beam breast computed tomography: A phantom study with radiochromic films. , 2009, , .		0
66	High-Resolution ^{125}I Small Animal Imaging With a Coded Aperture and a Hybrid Pixel Detector. IEEE Transactions on Nuclear Science, 2008, 55, 481-490.	1.2	26
67	High resolution ¹²⁵I pinhole SPECT imaging of the mouse thyroid with the MediSPECT small animal CdTe scanner. , 2008, , .		1
68	Early detection of tumor masses by in vivo hematoporphyrin-mediated fluorescence imaging. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2007, 571, 392-395.	0.7	5
69	Preliminary evaluation of the tomographic performance of the mediSPECT small animal imaging system. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2007, 571, 415-418.	0.7	25
70	Optimization of the acquisition parameters for a SPET system dedicated to breast imaging. , 2006, , .		0
71	Multimodal system for in vivo tumor imaging in mice. , 2006, , .		3
72	CdTe hybrid pixel detector for imaging with thermal neutrons. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2006, 563, 238-241.	0.7	17

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73	Tritium digital autoradiography with a Medipix2 hybrid silicon pixel detector. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2004, 516, 554-563.	0.7	20
74	A digital autoradiography system based on the Medipix2 chip: images of 3H and 14C microscales. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2004, 518, 404-405.	0.7	5
75	Design of a compact gamma camera with semiconductor hybrid pixel detectors: imaging tests with a pinhole collimator. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2003, 509, 321-327.	0.7	15
76	First images of a digital autoradiography system based on a Medipix2 hybrid silicon pixel detector. Physics in Medicine and Biology, 2003, 48, N173-N181.	1.6	33
77	<title>Digital system based on a bichromatic x-ray source and a single-photon counting device: a single-exposure dual-energy mammography approach</title>. , 2002, , .		5
78	Preliminary test of an imaging probe for nuclear medicine using hybrid pixel detectors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2002, 487, 193-201.	0.7	19
79	Investigation on semi-insulating GaAs detectors using laser-induced current pulses. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2001, 458, 158-163.	0.7	8
80	Noise and interpixel dead space studies of GaAs pixellated detectors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2001, 458, 164-168.	0.7	5
81	Characterization of 600-Î¼m-thick SI-GaAs detectors for medical imaging. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2001, 466, 79-86.	0.7	9
82	Response of semi-insulating GaAs detectors to near-infrared picosecond light pulses. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2001, 466, 105-114.	0.7	5
83	Response of semi-insulating GaAs detectors to low energy protons. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2001, 466, 155-161.	0.7	4
84	<title>Quasi-cw tissue transillumination at 1064 nm</title>. , 1997, 2979, 688.		0
85	Nonlinear scattering in a polymeric blend. Optics Communications, 1994, 112, 169-174.	1.0	5
86	Detection of x rays with a fiber-optic interferometric sensor. Applied Optics, 1993, 32, 1229.	2.1	2
87	Frequency Distribution of the Time Interval between Quick Phase Nystagmic Eye Movements. Ophthalmic Research, 1990, 22, 178-182.	1.0	9
88	Quantitative photoacoustic spectroscopy of cataractous human lenses. Journal of Photochemistry and Photobiology B: Biology, 1990, 4, 407-417.	1.7	11
89	On the Variations of the Time Constant of the Slow-Phase Eye Movements Produced by Surgical Therapy of Congenital Nystagmus: A Preliminary Report. Ophthalmic Research, 1989, 21, 345-351.	1.0	3
90	Amount of Surgery in Congenital Nystagmus. Ophthalmologica, 1989, 198, 145-151.	1.0	6