

Alessandro Lo Giudice

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/9456912/publications.pdf>

Version: 2024-02-01

125
papers

2,127
citations

236612

25
h-index

360668

35
g-index

125
all docs

125
docs citations

125
times ranked

2388
citing authors

#	ARTICLE	IF	CITATIONS
1	The study of ancient archaeological finds through X-ray tomography: the case of the "Tintinnabulum" from the Museum of Anthropology and Ethnography of Torino. <i>Journal of Physics: Conference Series</i> , 2022, 2204, 012034.	0.3	0
2	Some insight into "bronze quadrigati": a multi-analytical approach. <i>Archaeological and Anthropological Sciences</i> , 2022, 14, .	0.7	1
3	Comparison of two ancient Egyptian Middle Kingdom statuettes from the Museo Egizio of Torino through computed tomographic measurements. <i>Journal of Archaeological Science: Reports</i> , 2022, 44, 103518.	0.2	2
4	The Role of PIXE and XRF in Heritage Science: The INFN-CHNet LABEC Experience. <i>Applied Sciences (Switzerland)</i> , 2022, 12, 6585.	1.3	9
5	The Importance of Being Versatile: INFN-CHNet MA-XRF Scanner on Furniture at the CCR "La Venaria Reale". <i>Applied Sciences (Switzerland)</i> , 2021, 11, 1197.	1.3	13
6	Detectors and Cultural Heritage: The INFN-CHNet Experience. <i>Applied Sciences (Switzerland)</i> , 2021, 11, 3462.	1.3	26
7	X-ray Imaging Investigation on the Gilding Technique of an Ancient Egyptian Taweret Wooden Statuette. <i>Journal of Imaging</i> , 2021, 7, 229.	1.7	10
8	X-ray Micro-Tomography as a Method to Distinguish and Characterize Natural and Cultivated Pearls. <i>Condensed Matter</i> , 2021, 6, 51.	0.8	2
9	Multi-technique study of He ⁺ micro-irradiation effects on natural quartz crystals contained in archaeological pottery. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2020, 479, 143-149.	0.6	4
10	Results on radiation tolerance of diamond detectors. <i>Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment</i> , 2019, 924, 241-244.	0.7	8
11	Improvements to the analytical protocol of lapis lazuli provenance: First study on Myanmar rock samples. <i>European Physical Journal Plus</i> , 2019, 134, 1.	1.2	9
12	A Micro-Tomographic Insight into the Coating Systems of Historical Bowed String Instruments. <i>Coatings</i> , 2019, 9, 81.	1.2	16
13	A multipurpose X-ray fluorescence scanner developed for in situ analysis. <i>Rendiconti Lincei</i> , 2019, 30, 307-322.	1.0	31
14	Potentialities of X-ray fluorescence analysis in numismatics: the case study of pre-Roman coins from Cisalpine Gaul. <i>Archaeological and Anthropological Sciences</i> , 2018, 10, 431-438.	0.7	9
15	Average and core silver content of ancient-debased coins via neutron diffraction and specific gravity. <i>Archaeological and Anthropological Sciences</i> , 2018, 10, 1585-1602.	0.7	3
16	Synchrotron radiation micro-computed tomography for the investigation of finishing treatments in historical bowed string instruments: Issues and perspectives. <i>European Physical Journal Plus</i> , 2018, 133, 1.	1.2	15
17	Towards a portable X-ray luminescence instrument for applications in the Cultural Heritage field. <i>European Physical Journal Plus</i> , 2018, 133, 1.	1.2	7
18	Protocol for lapis lazuli provenance determination: evidence for an Afghan origin of the stones used for ancient carved artefacts kept at the Egyptian Museum of Florence (Italy). <i>Archaeological and Anthropological Sciences</i> , 2017, 9, 637-651.	0.7	20

#	ARTICLE	IF	CITATIONS
19	A new digital radiography system for paintings on canvas and on wooden panels of large dimensions. , 2017, , .		6
20	Diamond Particle Detectors for High Energy Physics. Nuclear and Particle Physics Proceedings, 2016, 273-275, 1023-1028.	0.2	9
21	Preliminary results on time-resolved ion beam induced luminescence applied to the provenance study of lapis lazuli. Nuclear Instruments & Methods in Physics Research B, 2016, 371, 336-339.	0.6	9
22	A 3D diamond detector for particle tracking. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2016, 824, 402-405.	0.7	9
23	Compositional and microstructural characterization of Celtic silver coins from northern Italy using neutron diffraction analysis. Microchemical Journal, 2016, 126, 501-508.	2.3	25
24	<i>μ</i> -XRF Analysis of Trace Elements in Lapis Lazuli-Forming Minerals for a Provenance Study. Microscopy and Microanalysis, 2015, 21, 526-533.	0.2	20
25	The stones of the statuary of the Egyptian Museum of Torino (Italy): geologic and petrographic characterization. Rendiconti Lincei, 2015, 26, 385-398.	1.0	5
26	Ion Beam Analysis for the provenance attribution of lapis lazuli used in glyptic art: The case of the "Collezione Medicea". Nuclear Instruments & Methods in Physics Research B, 2015, 348, 278-284.	0.6	23
27	A 3-dimensional interdigitated electrode geometry for the enhancement of charge collection efficiency in diamond detectors. Europhysics Letters, 2014, 108, 18001.	0.7	17
28	X-ray tomography of large wooden artworks: the case study of "Doppio corpo" by Pietro Piffetti. Heritage Science, 2014, 2, .	1.0	38
29	Archaeological, archaeomagnetic and thermoluminescence investigation of a baked clay kiln excavated at Chieri, northern Italy: contribution to the rescue of our cultural heritage. Annals of Geophysics, 2014, 57, .	0.5	1
30	New markers to identify the provenance of lapis lazuli: trace elements in pyrite by means of micro-PIXE. Applied Physics A: Materials Science and Processing, 2013, 111, 69-74.	1.1	28
31	Characterization of a neutron imaging setup at the INES facility. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2013, 726, 31-36.	0.7	6
32	Combined archaeomagnetic and thermoluminescence study of a brick kiln excavated at Fontanetto Po (Vercelli, Northern Italy). Journal of Archaeological Science, 2013, 40, 2025-2035.	1.2	21
33	IBIC characterization of an ion-beam-micromachined multi-electrode diamond detector. Nuclear Instruments & Methods in Physics Research B, 2013, 306, 181-185.	0.6	22
34	Results of the Italian neu_ART project. IOP Conference Series: Materials Science and Engineering, 2012, 37, 012007.	0.3	13
35	In-air broad beam ionoluminescence microscopy as a tool for rocks and stone artworks characterisation. Analytical and Bioanalytical Chemistry, 2012, 404, 277-281.	1.9	16
36	Diamond pixel modules. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2011, 636, S125-S129.	0.7	30

#	ARTICLE	IF	CITATIONS
37	Monte Carlo analysis of a lateral IBIC experiment on a 4H-SiC Schottky diode. Nuclear Instruments & Methods in Physics Research B, 2011, 269, 2350-2354.	0.6	5
38	Lapis lazuli provenance study by means of micro-PIXE. Nuclear Instruments & Methods in Physics Research B, 2011, 269, 2373-2377.	0.6	38
39	Lateral IBIC characterization of single crystal synthetic diamond detectors. Physica Status Solidi - Rapid Research Letters, 2011, 5, 80-82.	1.2	10
40	Direct fabrication and IV characterization of sub-surface conductive channels in diamond with MeV ion implantation. European Physical Journal B, 2010, 75, 127-132.	0.6	18
41	Finite element analysis of ion-implanted diamond surface swelling. Nuclear Instruments & Methods in Physics Research B, 2010, 268, 2991-2995.	0.6	32
42	Luminescence centers in proton irradiated single crystal CVD diamond. Diamond and Related Materials, 2010, 19, 854-860.	1.8	18
43	Controlled variation of the refractive index in ion-damaged diamond. Diamond and Related Materials, 2010, 19, 428-431.	1.8	28
44	Formation of buried conductive micro-channels in single crystal diamond with MeV C and He implantation. Diamond and Related Materials, 2010, 19, 466-469.	1.8	22
45	Multitechnique characterization of lapis lazuli for provenance study. Analytical and Bioanalytical Chemistry, 2009, 395, 2211-2217.	1.9	42
46	IBIC analysis of CdTe/CdS solar cells. Nuclear Instruments & Methods in Physics Research B, 2009, 267, 2181-2184.	0.6	19
47	A diamond-based biosensor for the recording of neuronal activity. Biosensors and Bioelectronics, 2009, 24, 2046-2050.	5.3	42
48	Semiconductor characterization by scanning ion beam induced charge (IBIC) microscopy. Nuclear Instruments & Methods in Physics Research B, 2008, 266, 1312-1318.	0.6	23
49	The ionoluminescence apparatus at the LABEC external microbeam facility. Nuclear Instruments & Methods in Physics Research B, 2008, 266, 2306-2310.	0.6	30
50	Recent developments of ion beam induced luminescence at the external scanning microbeam facility of the LABEC laboratory in Florence. Nuclear Instruments & Methods in Physics Research B, 2008, 266, 1527-1532.	0.6	24
51	A comprehensive study on hydrogenated diamond surfaces as obtained by using molecular hydrogen. Diamond and Related Materials, 2008, 17, 1154-1158.	1.8	10
52	Performances of Epitaxial Diamond in the Field of X-ray Diagnostics. Materials Research Society Symposia Proceedings, 2007, 1039, 1.	0.1	0
53	Ion Beam Induced Charge characterization of epitaxial single crystal CVD diamond. Diamond and Related Materials, 2007, 16, 940-943.	1.8	3
54	Diamond surface conductivity after exposure to molecular hydrogen. Diamond and Related Materials, 2007, 16, 836-839.	1.8	11

#	ARTICLE	IF	CITATIONS
55	Performances of 4H-SiC Schottky diodes as neutron detectors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2007, 583, 177-180.	0.7	38
56	Measurement of charge collection profiles in irradiated silicon diodes by lateral IBIC technique. Nuclear Instruments & Methods in Physics Research B, 2007, 260, 259-263.	0.6	11
57	Low temperature CL investigation of BN1 vibronic structure in c-BN. Diamond and Related Materials, 2006, 15, 1166-1168.	1.8	3
58	The primed state of CVD diamond under blue light illumination. Diamond and Related Materials, 2006, 15, 735-738.	1.8	2
59	Radiological X-ray dosimetry with single crystal CVD diamond detectors. Diamond and Related Materials, 2006, 15, 797-801.	1.8	21
60	Memory effects in CVD diamond. Diamond and Related Materials, 2006, 15, 1467-1471.	1.8	11
61	Radiation hard diamond sensors for future tracking applications. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2006, 565, 278-283.	0.7	82
62	Angle resolved IBIC analysis of 4H-SiC Schottky diodes. Nuclear Instruments & Methods in Physics Research B, 2006, 249, 213-216.	0.6	11
63	Performances of homoepitaxial single crystal diamond in diagnostic x-ray dosimetry. Applied Physics Letters, 2006, 88, 151901.	1.5	16
64	Vibronic spectrum of c-BN measured with cathodoluminescence. Physical Review B, 2006, 74, .	1.1	7
65	Development of radiation tolerant semiconductor detectors for the Super-LHC. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2005, 546, 99-107.	0.7	29
66	Radiation-hard semiconductor detectors for SuperLHC. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2005, 541, 189-201.	0.7	55
67	Temperature dependent IBIC study of 4H-SiC Schottky diodes. Nuclear Instruments & Methods in Physics Research B, 2005, 231, 491-496.	0.6	6
68	Lateral IBIC analysis of GaAs Schottky diodes. Nuclear Instruments & Methods in Physics Research B, 2005, 231, 513-517.	0.6	5
69	Recent advancements in the development of radiation hard semiconductor detectors for S-LHC. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2005, 552, 7-19.	0.7	33
70	SiC detectors for neutron monitoring. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2005, 552, 131-137.	0.7	43
71	Average energy dissipated by mega-electron-volt hydrogen and helium ions per electron-hole pair generation in 4H-SiC. Applied Physics Letters, 2005, 87, 222105.	1.5	27
72	Recent IBIC measurements on epitaxial CVD diamond. Diamond and Related Materials, 2005, 14, 1988-1991.	1.8	2

#	ARTICLE	IF	CITATIONS
73	Cellular adhesion and neuronal excitability on functionalised diamond surfaces. <i>Diamond and Related Materials</i> , 2005, 14, 669-674.	1.8	48
74	New developments in CVD diamond for detector applications. <i>European Physical Journal C</i> , 2004, 33, s1014-s1016.	1.4	7
75	Investigation of chemical vapour deposition diamond detectors by X-ray micro-beam induced current and X-ray micro-beam induced luminescence techniques. <i>Spectrochimica Acta, Part B: Atomic Spectroscopy</i> , 2004, 59, 1565-1573.	1.5	2
76	Characterization of impurities in cubic boron nitride crystallites with thermoluminescence and ionoluminescence. <i>Physica Status Solidi A</i> , 2004, 201, 2566-2572.	1.7	9
77	Photocurrent study of beta-ray priming in CVD diamond. <i>Diamond and Related Materials</i> , 2004, 13, 914-917.	1.8	3
78	Ion and X-ray micro-beam induced charge collection and their applications in CVD diamond detector characterisation. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2003, 210, 159-163.	0.6	6
79	Micro-IL and micro-PIXE studies of rich diamond meteorites at Legnaro nuclear microprobe. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2003, 210, 429-433.	0.6	10
80	The development of diamond tracking detectors for the LHC. <i>Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment</i> , 2003, 514, 79-86.	0.7	41
81	New results on diamond pixel sensors using ATLAS frontend electronics. <i>Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment</i> , 2003, 501, 153-159.	0.7	7
82	Status of the R&D activity on diamond particle detectors. <i>Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment</i> , 2003, 511, 124-131.	0.7	26
83	Time-resolved ion beam-induced charge collection measurement of minority carrier lifetime in semiconductor power devices by using Gunn's theorem. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2003, 102, 193-197.	1.7	11
84	Investigation of 4H-SiC Schottky diodes by ion and X-ray micro beam induced charge collection techniques. <i>Diamond and Related Materials</i> , 2003, 12, 667-671.	1.8	2
85	Blue light sensitization of CVD diamond detectors. <i>Diamond and Related Materials</i> , 2003, 12, 662-666.	1.8	10
86	Control of Hydrogenation Patterning for CVD Diamond Substrates by AFM Local Anodic Oxidation. <i>Surface Engineering</i> , 2003, 19, 441-446.	1.1	9
87	Cathodoluminescence investigations on the Popigai, Ries, and Lappajärvi impact diamonds. <i>American Mineralogist</i> , 2003, 88, 1778-1787.	0.9	16
88	Effects of light on the π -primed state of CVD diamond nuclear detectors. <i>Diamond and Related Materials</i> , 2002, 11, 446-450.	1.8	30
89	A CVD diamond beam telescope for charged particle tracking. <i>IEEE Transactions on Nuclear Science</i> , 2002, 49, 1857-1862.	1.2	2
90	Imaging of charge collection properties of a CVD diamond detector using X-ray-induced current microscopy. <i>Diamond and Related Materials</i> , 2002, 11, 1472-1478.	1.8	9

#	ARTICLE	IF	CITATIONS
91	Homogeneity of CVD diamond detectors in tracking applications. Nuclear Instruments & Methods in Physics Research B, 2002, 187, 566-578.	0.6	16
92	Measurements of charge collection profiles in virgin and strongly irradiated silicon diodes by means of the micro-IBICC technique. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2002, 476, 607-613.	0.7	5
93	Radiation tolerance of CVD diamond detectors for pions and protons. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2002, 476, 686-693.	0.7	27
94	Performance of irradiated CVD diamond micro-strip sensors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2002, 476, 706-712.	0.7	13
95	CVD diamond sensors for charged particle detection. Diamond and Related Materials, 2001, 10, 1778-1782.	1.8	12
96	Ionoluminescence in CVD diamond and in cubic boron nitride. Diamond and Related Materials, 2001, 10, 568-573.	1.8	38
97	CVD diamond microdosimeters. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2001, 458, 360-364.	0.7	22
98	Diamond Pixel Detectors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2001, 465, 88-91.	0.7	10
99	Investigation of 4H-SiC Schottky diodes by ion beam induced charge (IBIC) technique. Applied Surface Science, 2001, 184, 448-454.	3.1	21
100	Ionoluminescence and Cathodoluminescence in Marbles of Historic and Architectural Interest. Archaeometry, 2001, 43, 439-446.	0.6	11
101	Light detection with spectral analysis at the Legnaro nuclear microprobe: Applications in material and earth sciences. Nuclear Instruments & Methods in Physics Research B, 2001, 181, 134-139.	0.6	15
102	Cytological and histological structures identification with the technique IBIL in elemental microanalysis. Nuclear Instruments & Methods in Physics Research B, 2001, 181, 437-442.	0.6	16
103	Micro-IBICC and micro-IL analyses of CVD diamond microdosimeters. Nuclear Instruments & Methods in Physics Research B, 2001, 181, 349-353.	0.6	2
104	Pulse height distribution and radiation tolerance of CVD diamond detectors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2000, 447, 244-250.	0.7	36
105	Micro-strip sensors based on CVD diamond. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2000, 453, 141-148.	0.7	17
106	Theory of ion beam induced charge collection in detectors based on the extended Shockley-Ramo theorem. Nuclear Instruments & Methods in Physics Research B, 2000, 161-163, 446-451.	0.6	39
107	Recent results with CVD diamond trackers. Nuclear Physics, Section B, Proceedings Supplements, 1999, 78, 329-334.	0.5	2
108	CVD diamond pixel detectors for LHC experiments. Nuclear Physics, Section B, Proceedings Supplements, 1999, 78, 497-504.	0.5	4

#	ARTICLE	IF	CITATIONS
109	Parameterisation of radiation effects on CVD diamond for proton irradiation. Nuclear Physics, Section B, Proceedings Supplements, 1999, 78, 675-682.	0.5	6
110	A simulation of a CdTe gamma ray detector based on collection efficiency profiles as determined by lateral IBIC. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 1999, 428, 81-87.	0.7	8
111	Review of the development of diamond radiation sensors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 1999, 434, 131-145.	0.7	60
112	The first bump-bonded pixel detectors on CVD diamond. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 1999, 436, 326-335.	0.7	21
113	CVD diamond detectors for ionizing radiation. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 1999, 435, 194-201.	0.7	26
114	Room temperature CVD diamond X-ray and charged particle microdetectors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 1999, 428, 118-126.	0.7	6
115	Evaluation of the diffusion length in silicon diodes by means of the lateral IBIC technique. Nuclear Instruments & Methods in Physics Research B, 1999, 158, 476-480.	0.6	16
116	IBIC analysis of gallium arsenide Schottky diodes. Nuclear Instruments & Methods in Physics Research B, 1999, 158, 470-475.	0.6	7
117	Ion microbeam analysis of CVD diamond. Diamond and Related Materials, 1999, 8, 1597-1601.	1.8	14
118	Tracking with CVD diamond radiation sensors at high luminosity colliders. IEEE Transactions on Nuclear Science, 1999, 46, 193-200.	1.2	15
119	Ion beam induced luminescence maps in CVD diamond as obtained by coincidence measurements. Diamond and Related Materials, 1999, 8, 1592-1596.	1.8	13
120	Thermoluminescence in CVD diamond films: application to radiation dosimetry. Diamond and Related Materials, 1999, 8, 1234-1239.	1.8	42
121	IBIC and IBIL microscopy applied to advanced semiconductor materials. Nuclear Instruments & Methods in Physics Research B, 1998, 136-138, 1333-1339.	0.6	20
122	CVD diamond detectors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 1998, 410, 96-99.	0.7	16
123	Ion beam induced luminescence and charge collection in CVD diamond. Diamond and Related Materials, 1998, 7, 742-747.	1.8	11
124	CVD diamond tips as X-ray detectors. Diamond and Related Materials, 1998, 7, 523-527.	1.8	20
125	Growth and characterisation of CVD diamond wires for X-ray detection. Diamond and Related Materials, 1997, 6, 1051-1056.	1.8	12