Roberto Passaquieti

List of Publications by Year
in descending order

129	10,274	126907	32842
papers	citations	33 h-index	100 g-index

129	129	129	5775
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Advanced Virgo: a second-generation interferometric gravitational wave detector. Classical and Quantum Gravity, 2015, 32, 024001.	4.0	2,530
2	The Einstein Telescope: a third-generation gravitational wave observatory. Classical and Quantum Gravity, 2010, 27, 194002.	4.0	1,211
3	Prospects for observing and localizing gravitational-wave transients with Advanced LIGO, Advanced Virgo and KAGRA. Living Reviews in Relativity, 2018, 21, 3.	26.7	808
4	Sensitivity studies for third-generation gravitational wave observatories. Classical and Quantum Gravity, 2011, 28, 094013.	4.0	644
5	Prospects for observing and localizing gravitational-wave transients with Advanced LIGO, Advanced Virgo and KAGRA. Living Reviews in Relativity, 2020, 23, 3.	26.7	447
6	Prospects for Observing and Localizing Gravitational-Wave Transients with Advanced LIGO and Advanced Virgo. Living Reviews in Relativity, 2016, 19, 1.	26.7	427
7	Scientific objectives of Einstein Telescope. Classical and Quantum Gravity, 2012, 29, 124013.	4.0	355
8	The third generation of gravitational wave observatories and their science reach. Classical and Quantum Gravity, 2010, 27, 084007.	4.0	287
9	Virgo: a laser interferometer to detect gravitational waves. Journal of Instrumentation, 2012, 7, P03012-P03012.	1.2	257
10	Characterization of transient noise in Advanced LIGO relevant to gravitational wave signal GW150914. Classical and Quantum Gravity, 2016, 33, 134001.	4.0	225
11	The Virgo status. Classical and Quantum Gravity, 2006, 23, S635-S642.	4.0	179
12	Status of the Virgo project. Classical and Quantum Gravity, 2011, 28, 114002.	4.0	171
13	Status of Virgo. Classical and Quantum Gravity, 2008, 25, 114045.	4.0	148
14	A Standard Siren Measurement of the Hubble Constant from GW170817 without the Electromagnetic Counterpart. Astrophysical Journal Letters, 2019, 871, L13.	8.3	145
15	A Gravitational-wave Measurement of the Hubble Constant Following the Second Observing Run of Advanced LIGO and Virgo. Astrophysical Journal, 2021, 909, 218.	4.5	144
16	Measuring gravitomagnetic effects by a multi-ring-laser gyroscope. Physical Review D, 2011, 84, .	4.7	126
17	Virgo status. Classical and Quantum Gravity, 2008, 25, 184001.	4.0	116
18	SEARCH FOR GRAVITATIONAL-WAVE INSPIRAL SIGNALS ASSOCIATED WITH SHORT GAMMA-RAY BURSTS DURING LIGO'S FIFTH AND VIRGO'S FIRST SCIENCE RUN. Astrophysical Journal, 2010, 715, 1453-1461.	4.5	90

#	Article	IF	Citations
19	Measurement of the VIRGO superattenuator performance for seismic noise suppression. Review of Scientific Instruments, 2001, 72, 3643-3652.	1.3	89
20	Status of VIRGO. Classical and Quantum Gravity, 2004, 21, S385-S394.	4.0	89
21	The present status of the VIRGO Central Interferometer*. Classical and Quantum Gravity, 2002, 19, 1421-1428.	4.0	85
22	Calibration and sensitivity of the Virgo detector during its second science run. Classical and Quantum Gravity, 2011, 28, 025005.	4.0	85
23	The status of VIRGO. Classical and Quantum Gravity, 2006, 23, S63-S69.	4.0	83
24	An inverted pendulum preisolator stage for the VIRGO suspension system. Review of Scientific Instruments, 1999, 70, 2507-2515.	1.3	82
25	Measurement of the seismic attenuation performance of the VIRGO Superattenuator. Astroparticle Physics, 2005, 23, 557-565.	4.3	79
26	The basic physics of the binary black hole merger GW150914. Annalen Der Physik, 2017, 529, 1600209.	2.4	69
27	Measurements of Superattenuator seismic isolation by Virgo interferometer. Astroparticle Physics, 2010, 33, 182-189.	4.3	62
28	Noise from scattered light in Virgo's second science run data. Classical and Quantum Gravity, 2010, 27, 194011.	4.0	59
29	Status of Virgo detector. Classical and Quantum Gravity, 2007, 24, S381-S388.	4.0	56
30	Status of Virgo. Classical and Quantum Gravity, 2005, 22, S869-S880.	4.0	54
31	Inertial control of the mirror suspensions of the VIRGO interferometer for gravitational wave detection. Review of Scientific Instruments, 2001, 72, 3653-3661.	1.3	52
32	Search for Gravitational Waves Associated with Gamma-Ray Bursts during the First Advanced LIGO Observing Run and Implications for the Origin of GRB 150906B. Astrophysical Journal, 2017, 841, 89.	4.5	52
33	Calibration of advanced Virgo and reconstruction of the gravitational wave signal h (t) Tj ETQq1 1 0.784314 rgBT /Ove	4.0	41
34	The maraging-steel blades of the Virgo super attenuator. Measurement Science and Technology, 2000, 11, 467-476.	2.6	31
35	The Virgo 3 km interferometer for gravitational wave detection. Journal of Optics, 2008, 10, 064009.	1.5	31
36	The VIRGO large mirrors: a challenge for low loss coatings. Classical and Quantum Gravity, 2004, 21, S935-S945.	4.0	30

#	Article	IF	Citations
37	Status and perspectives of the Virgo gravitational wave detector. Journal of Physics: Conference Series, 2010, 203, 012074.	0.4	29
38	Search for gravitational waves associated with GRB 050915a using the Virgo detector. Classical and Quantum Gravity, 2008, 25, 225001.	4.0	28
39	The Seismic Superattenuators of the Virgo Gravitational Waves Interferometer. Journal of Low Frequency Noise Vibration and Active Control, 2011, 30, 63-79.	2.9	28
40	The Advanced Virgo detector. Journal of Physics: Conference Series, 2015, 610, 012014.	0.4	27
41	Properties of seismic noise at the Virgo site. Classical and Quantum Gravity, 2004, 21, S433-S440.	4.0	25
42	The commissioning of the central interferometer of the Virgo gravitational wave detector. Astroparticle Physics, 2004, 21, 1-22.	4.3	22
43	A local control system for the test masses of the Virgo gravitational wave detector. Astroparticle Physics, 2004, 20, 617-628.	4.3	22
44	The variable finesse locking technique. Classical and Quantum Gravity, 2006, 23, S85-S89.	4.0	22
45	Virgo upgrade investigations. Journal of Physics: Conference Series, 2006, 32, 223-229.	0.4	21
46	Performance of â€œG-Pisaâ€•ring laser gyro at the Virgo site. Journal of Seismology, 2012, 16, 757-766.	1.3	20
47	First joint observation by the underground gravitational-wave detector KAGRA with GEO 600. Progress of Theoretical and Experimental Physics, 2022, 2022, .	6.6	20
48	First locking of the Virgo central area interferometer with suspension hierarchical control. Astroparticle Physics, 2004, 20, 629-640.	4.3	19
49	Gravitational waves by gamma-ray bursts and the Virgo detector: the case of GRB 050915a. Classical and Quantum Gravity, 2007, 24, S671-S679.	4.0	19
50	The Virgo automatic alignment system. Classical and Quantum Gravity, 2006, 23, S91-S101.	4.0	16
51	Lock acquisition of the Virgo gravitational wave detector. Astroparticle Physics, 2008, 30, 29-38.	4.3	16
52	Gravitational wave burst search in the Virgo C7 data. Classical and Quantum Gravity, 2009, 26, 085009.	4.0	16
53	VIRGO: a large interferometer for gravitational wave detection started its first scientific run. Journal of Physics: Conference Series, 2008, 120, 032007.	0.4	15
54	Measurement of the transfer function of the steering filter of the Virgo super attenuator suspension. Review of Scientific Instruments, 2001, 72, 3635-3642.	1.3	14

#	Article	IF	Citations
55	Last stage control and mechanical transfer function measurement of the VIRGO suspensions. Review of Scientific Instruments, 2002, 73, 2143-2149.	1.3	14
56	Monitoring the acoustic emission of the blades of the mirror suspension for a gravitational wave interferometer. Physics Letters, Section A: General, Atomic and Solid State Physics, 2002, 301, 389-397.	2.1	14
57	Low-loss coatings for the VIRGO large mirrors. , 2004, , .		14
58	Performances of an ultralow frequency vertical pre-isolator for the VIRGO seismic attenuation chains. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 1999, 420, 316-335.	1.6	13
59	Search for inspiralling binary events in the Virgo Engineering Run data. Classical and Quantum Gravity, 2004, 21, S709-S716.	4.0	13
60	Coincidence analysis between periodic source candidates in C6 and C7 Virgo data. Classical and Quantum Gravity, 2007, 24, S491-S499.	4.0	13
61	Measurement of the optical parameters of the Virgo interferometer. Applied Optics, 2007, 46, 3466.	2.1	13
62	First joint gravitational wave search by the AURIGAâ€“EXPLORERâ€“NAUTILUSâ€“Virgo Collaboration. Classical and Quantum Gravity, 2008, 25, 205007.	4.0	13
63	Performance of the Virgo interferometer longitudinal control system during the second science run. Astroparticle Physics, 2011, 34, 521-527.	4.3	13
64	The NoEMi (Noise Frequency Event Miner) framework. Journal of Physics: Conference Series, 2012, 363, 012037.	0.4	12
65	Automatic Alignment for the first science run of the Virgo interferometer. Astroparticle Physics, 2010, 33, 131-139.	4.3	11
66	Central heating radius of curvature correction (CHRoCC) for use in large scale gravitational wave interferometers. Classical and Quantum Gravity, 2013, 30, 055017.	4.0	11
67	The Virgo Detector. AIP Conference Proceedings, 2005, , .	0.4	10
68	Improving the timing precision for inspiral signals found by interferometric gravitational wave detectors. Classical and Quantum Gravity, 2007, 24, S617-S625.	4.0	10
69	Cleaning the Virgo sampled data for the search of periodic sources of gravitational waves. Classical and Quantum Gravity, 2009, 26, 204002.	4.0	10
70	Reconstruction of the gravitational wave signal h (t) during the Virgo science runs and independent validation with a photon calibrator. Classical and Quantum Gravity, 2014, 31, 165013.	4.0	10
71	Status of VIRGO. Classical and Quantum Gravity, 2003, 20, S609-S616.	4.0	9
72	Analysis of noise lines in the Virgo C7 data. Classical and Quantum Gravity, 2007, 24, S433-S443.	4.0	9

#	Article	IF	Citations
73	Status of coalescing binaries search activities in Virgo. Classical and Quantum Gravity, 2007, 24, 5767-5775.	4.0	9
74	Status of Advanced Virgo. EPJ Web of Conferences, 2018, 182, 02003.	0.3	9
75	Vibration isolation system with a compact damping system for power recycling mirrors of KAGRA. Classical and Quantum Gravity, 2019, 36, 095015.	4.0	9
76	The advanced Virgo longitudinal control system for the O2 observing run. Astroparticle Physics, 2020, 116, 102386.	4.3	9
77	Advanced Virgo Status. Journal of Physics: Conference Series, 2020, 1342, 012010.	0.4	9
78	Noise studies during the first Virgo science run and after. Classical and Quantum Gravity, 2008, 25, 184003.	4.0	8
79	Laser with an in-loop relative frequency stability of<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:mn>1.0</mml:mn><mml:mo>Ã—</mml:mo><mml:msup><mml:mrow><mml:mn>10</mml:mn> a 100-ms time scale for gravitational-wave detection. Physical Review A, 2009, 79, .	2.5	8
80	Virgo calibration and reconstruction of the gravitationnal wave strain during VSR1. Journal of Physics: Conference Series, 2010, 228, 012015.	0.4	8
81	A state observer for the Virgo inverted pendulum. Review of Scientific Instruments, 2011, 82, 094502.	1.3	8
82	Seismic isolation by mechanical filters at very low frequencies. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 1998, 409, 480-483.	1.6	7
83	Data analysis methods for non-Gaussian, nonstationary and nonlinear features and their application to VIRGO. Classical and Quantum Gravity, 2003, 20, S915-S924.	4.0	7
84	NAP: a tool for noise data analysis. Application to Virgo engineering runs. Classical and Quantum Gravity, 2005, 22, S1041-S1049.	4.0	7
85	The status of coalescing binaries search code in Virgo, and the analysis of C5 data. Classical and Quantum Gravity, 2006, 23, S187-S196.	4.0	7
86	The Virgo interferometric gravitational antenna. Optics and Lasers in Engineering, 2007, 45, 478-487.	3.8	7
87	The Real-Time Distributed Control of the Virgo Interferometric Detector of Gravitational Waves. IEEE Transactions on Nuclear Science, 2008, 55, 302-310.	2.0	7
88	Status report of the low frequency facility experiment, Virgo R&D. Physics Letters, Section A: General, Atomic and Solid State Physics, 2003, 318, 199-204.	2.1	6
89	The low frequency facility Fabryâ€“Perot cavity used as a speed-meter. Physics Letters, Section A: General, Atomic and Solid State Physics, 2003, 316, 1-9.	2.1	6
90	A simple line detection algorithm applied to Virgo data. Classical and Quantum Gravity, 2005, 22, S1189-S1196.	4.0	6

#	Article	IF	Citations
91	Automatic Alignment system during the second science run of the Virgo interferometer. Astroparticle Physics, 2011, 34, 327-332.	4.3	6
92	Status of the Advanced Virgo gravitational wave detector. International Journal of Modern Physics A, 2017, 32, 1744003.	1.5	6
93	Results of the Virgo central interferometer commissioning. Classical and Quantum Gravity, 2004, 21, S395-S402.	4.0	5
94	The last-stage suspension of the mirrors for the gravitational wave antenna Virgo. Classical and Quantum Gravity, 2004, 21, S425-S432.	4.0	5
95	Testing the detection pipelines for inspirals with Virgo commissioning run C4 data. Classical and Quantum Gravity, 2005, 22, S1139-S1148.	4.0	5
96	Length Sensing and Control in the Virgo Gravitational Wave Interferometer. IEEE Transactions on Instrumentation and Measurement, 2006, 55, 1985-1995.	4.7	5
97	Data Acquisition System of the Virgo Gravitational Waves Interferometric Detector. IEEE Transactions on Nuclear Science, 2008, 55, 225-232.	2.0	5
98	Characterization of the Virgo seismic environment. Classical and Quantum Gravity, 2012, 29, 025005.	4.0	5
99	Elastic and anelastic properties of Marval 18 steel. Journal of Alloys and Compounds, 2000, 310, 400-404.	5.5	4
100	First results of the low frequency facility experiment. Classical and Quantum Gravity, 2004, 21, S1099-S1106.	4.0	4
101	Sensitivity of the Low Frequency Facility experiment around 10ÂHz. Physics Letters, Section A: General, Atomic and Solid State Physics, 2004, 322, 1-9.	2.1	4
102	A first study of environmental noise coupling to the Virgo interferometer. Classical and Quantum Gravity, 2005, 22, S1069-S1077.	4.0	4
103	Environmental noise studies in Virgo. Journal of Physics: Conference Series, 2006, 32, 80-88.	0.4	4
104	Data quality studies for burst analysis of Virgo data acquired during Weekly Science Runs. Classical and Quantum Gravity, 2007, 24, S415-S422.	4.0	4
105	Control of the laser frequency of the Virgo gravitational wave interferometer with an in-loop relative frequency stability of 1.0 Ã— 10â˜’21 on a 100 ms time scale. , 2009, , .		4
106	Directional radiative cooling thermal compensation for gravitational wave interferometer mirrors. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2009, 607, 530-537.	1.6	4
107	THE VIRGO INTERFEROMETER FOR GRAVITATIONAL WAVE DETECTION. International Journal of Modern Physics D, 2011, 20, 2075-2079.	2.1	4
108	Virgo and interferometer for gravitational wave detection. Nuclear Physics, Section B, Proceedings Supplements, 2000, 85, 241-247.	0.4	3

#	Article	IF	Citations
109	Status of the low frequency facility experiment. Classical and Quantum Gravity, 2002, 19, 1675-1682.	4.0	3
110	Status of Virgo. Journal of Physics: Conference Series, 2006, 39, 32-35.	0.4	3
111	Testing Virgo burst detection tools on commissioning run data. Classical and Quantum Gravity, 2006, 23, S197-S205.	4.0	3
112	Status of VIRGO. , 2004, 5500, 58.		2
113	Virgo and the worldwide search for gravitational waves. AIP Conference Proceedings, 2005, , .	0.4	2
114	Virgo status and commissioning results. Classical and Quantum Gravity, 2005, 22, S185-S191.	4.0	2
115	Experimental upper limit on the estimated thermal noise at low frequencies in a gravitational wave detector. Physical Review D, 2007, 76, .	4.7	2
116	Noise monitor tools and their application to Virgo data. Journal of Physics: Conference Series, 2012, 363, 012024.	0.4	2
117	Prospects for observing and localizing gravitational-wave transients with Advanced LIGO, Advanced Virgo and KAGRA. , 2018, 21, 1.		2
118	A first test of a sine-Hough method for the detection of pulsars in binary systems using the E4 Virgo engineering run data. Classical and Quantum Gravity, 2004, 21, S717-S727.	4.0	1
119	Methods of gravitational wave detection in the VIRGO Interferometer. , 2007, , .		1
120	The Real-time Distributed Control of the Virgo Interferometric Detector of Gravitational Waves. , 2007, , .		1
121	High sensitivity rotation measurements with a mid-size laser gyroscope. Proceedings of SPIE, 2010, , .	0.8	1
122	Status of the commissioning of the Virgo interferometer. , 2012, , .		1
123	A parallel in-time analysis system for Virgo.. Journal of Physics: Conference Series, 2006, 32, 35-43.	0.4	0
124	Normal/independent noise in VIRGO data. Classical and Quantum Gravity, 2006, 23, S829-S836.	4.0	0
125	Data Acquisition System of the Virgo Gravitational Waves Interferometric Detector. , 2007, , .		0
126	A cross-correlation method to search for gravitational wave bursts with AURIGA and Virgo. Classical and Quantum Gravity, 2008, 25, 114046.	4.0	0

#	Article	IF	Citations
127	Thermal control of a dual mode parametric sapphire transducer. , 2009, , .		0
128	Tools for noise characterization in Virgo. Journal of Physics: Conference Series, 2010, 243, 012004.	0.4	0
129	Thermal control of a dual mode parametric sapphire transducer. IEEE Transactions on Ultrasonics, Ferroelectrics, and Frequency Control, 2010, 57, 121-125.	3.0	0