

Shannon Whitlock

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/5724704/publications.pdf>

Version: 2024-02-01

54
papers

2,068
citations

218677

26
h-index

233421

45
g-index

55
all docs

55
docs citations

55
times ranked

1475
citing authors

#	ARTICLE	IF	CITATIONS
1	Glassy Dynamics in a Disordered Heisenberg Quantum Spin System. <i>Physical Review X</i> , 2021, 11, .	8.9	29
2	Epidemic growth and Griffiths effects on an emergent network of excited atoms. <i>Nature Communications</i> , 2021, 12, 103.	12.8	13
3	Hydrodynamic Stabilization of Self-Organized Criticality in a Driven Rydberg Gas. <i>Physical Review Letters</i> , 2021, 126, 123401.	7.8	3
4	Quantum simulation and computing with Rydberg-interacting qubits. <i>AVS Quantum Science</i> , 2021, 3, .	4.9	144
5	Unitary and Nonunitary Quantum Cellular Automata with Rydberg Arrays. <i>Physical Review Letters</i> , 2020, 124, 070503.	7.8	41
6	Preparation of hundreds of microscopic atomic ensembles in optical tweezer arrays. <i>Npj Quantum Information</i> , 2020, 6, .	6.7	32
7	Two-dimensional spectroscopy of Rydberg gases. <i>New Journal of Physics</i> , 2020, 22, 073040.	2.9	1
8	Signatures of self-organized criticality in an ultracold atomic gas. <i>Nature</i> , 2020, 577, 481-486.	27.8	50
9	Realization of a Rydberg-Dressed Ramsey Interferometer and Electrometer. <i>Physical Review Letters</i> , 2019, 122, 053601.	7.8	37
10	Diffusive to Nonergodic Dipolar Transport in a Dissipative Atomic Medium. <i>Physical Review Letters</i> , 2019, 123, 213606.	7.8	10
11	Relaxation of an Isolated Dipolar-Interacting Rydberg Quantum Spin System. <i>Physical Review Letters</i> , 2018, 120, 063601.	7.8	54
12	Uncovering the nonequilibrium phase structure of an open quantum spin system. <i>Physical Review A</i> , 2018, 98, .	2.5	24
13	Simulating quantum spin models using Rydberg-excited atomic ensembles in magnetic microtrap arrays. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2017, 50, 074001.	1.5	29
14	Versatile, high-power 460 nm laser system for Rydberg excitation of ultracold potassium. <i>Optics Express</i> , 2017, 25, 14829.	3.4	17
15	Density matrix reconstruction of three-level atoms via Rydberg electromagnetically induced transparency. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2016, 49, 164002.	1.5	12
16	Magnetic lattices for ultracold atoms and degenerate quantum gases. <i>Science Bulletin</i> , 2016, 61, 1097-1106.	9.0	12
17	Two-body interactions and decay of three-level Rydberg-dressed atoms. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2016, 49, 03LT02.	1.5	16
18	Correlated Exciton Transport in Rydberg-Dressed-Atom Spin Chains. <i>Physical Review Letters</i> , 2015, 115, 093002.	7.8	76

#	ARTICLE	IF	CITATIONS
19	Sub-micron period lattice structures of magnetic microtraps for ultracold atoms on an atom chip. Journal Physics D: Applied Physics, 2015, 48, 115002.	2.8	18
20	Radio-frequency spectroscopy of a linear array of Bose-Einstein condensates in a magnetic lattice. Physical Review A, 2015, 91, .	2.5	7
21	Quantum Simulation of Energy Transport with Embedded Rydberg Aggregates. Physical Review Letters, 2015, 114, 123005.	7.8	51
22	Semianalytical model for nonlinear absorption in strongly interacting Rydberg gases. Physical Review A, 2014, 89, .	2.5	18
23	Collective Excitation of Rydberg-Atom Ensembles beyond the Superatom Model. Physical Review Letters, 2014, 113, 233002.	7.8	24
24	Full Counting Statistics of Laser Excited Rydberg Aggregates in a One-Dimensional Geometry. Physical Review Letters, 2014, 112, 013002.	7.8	116
25	An experimental approach for investigating many-body phenomena in Rydberg-interacting quantum systems. Frontiers of Physics, 2014, 9, 571-586.	5.0	27
26	Periodic array of Bose-Einstein condensates in a magnetic lattice. Physical Review A, 2014, 89, .	2.5	33
27	Observing the Dynamics of Dipole-Mediated Energy Transport by Interaction-Enhanced Imaging. Science, 2013, 342, 954-956.	12.6	187
28	Sub-Poissonian Statistics of Rydberg-Interacting Dark-State Polaritons. Physical Review Letters, 2013, 110, 203601.	7.8	86
29	Spontaneous Avalanche Ionization of a Strongly Blockaded Rydberg Gas. Physical Review Letters, 2013, 110, 045004.	7.8	71
30	Interaction Enhanced Imaging of Individual Rydberg Atoms in Dense Gases. Physical Review Letters, 2012, 108, 013002.	7.8	85
31	Crossover from 2D to 3D in a Weakly Interacting Fermi Gas. Physical Review Letters, 2011, 106, 105304.	7.8	113
32	Trapping of ultracold atoms in a 10 μm-period permanent magnetic lattice. , 2011, , .		0
33	Box traps on an atom chip for one-dimensional quantum gases. Journal of Physics B: Atomic, Molecular and Optical Physics, 2010, 43, 155002.	1.5	36
34	ARRAY OF MESOSCOPIC ENSEMBLES ON A MAGNETIC ATOM CHIP. , 2010, , .		0
35	Detection of small atom numbers through image processing. Physical Review A, 2010, 82, .	2.5	72
36	Spatially resolved excitation of Rydberg atoms and surface effects on an atom chip. Physical Review A, 2010, 81, .	2.5	115

#	ARTICLE	IF	CITATIONS
37	Sub-Poissonian Atom-Number Fluctuations by Three-Body Loss in Mesoscopic Ensembles. Physical Review Letters, 2010, 104, 120402.	7.8	30
38	Optimized magnetic lattices for ultracold atomic ensembles. New Journal of Physics, 2010, 12, 103029.	2.9	24
39	Fabricating atom chips with femtosecond laser ablation. Journal of Physics B: Atomic, Molecular and Optical Physics, 2009, 42, 085301.	1.5	4
40	Two-dimensional array of microtraps with atomic shift register on a chip. New Journal of Physics, 2009, 11, 023021.	2.9	88
41	Scanning magnetoresistance microscopy of atom chips. Review of Scientific Instruments, 2008, 79, 023702.	1.3	7
42	Fully permanent magnet atom chip for Bose-Einstein condensation. Physical Review A, 2008, 77, .	2.5	19
43	Longitudinal character of atom-chip-based rf-dressed potentials. Physical Review A, 2008, 77, .	2.5	21
44	BOSE-EINSTEIN CONDENSATES ON MAGNETIC FILM MICROSTRUCTURES. , 2008, , .		1
45	Dynamics of Bose-Einstein condensates in an asymmetric double-well. , 2007, , .		0
46	Permanent magnet atom chips for BEC and microtrap arrays. , 2007, , .		0
47	Effect of magnetization inhomogeneity on magnetic microtraps for atoms. Physical Review A, 2007, 75, .	2.5	20
48	Lattice of microtraps for ultracold atoms based on patterned magnetic films. Physical Review A, 2007, 76, .	2.5	51
49	Condensate Splitting in an Asymmetric Double Well for Atom Chip Based Sensors. Physical Review Letters, 2007, 98, 030402.	7.8	80
50	Fabrication of Atom Chips with Femtosecond Laser Ablation. , 2007, , .		0
51	A permanent magnetic film atom chip for Bose-Einstein condensation. Journal of Physics B: Atomic, Molecular and Optical Physics, 2006, 39, 27-36.	1.5	32
52	Perpendicularly magnetized, grooved GdTbFeCo microstructures for atom optics. Journal Physics D: Applied Physics, 2005, 38, 4015-4020.	2.8	21
53	BOSE-EINSTEIN CONDENSATES ON A PERMANENT MAGNETIC FILM ATOM CHIP. , 2005, , .		2
54	UBR1 photometry of globular clusters in the Leo group galaxy NGC 3379. Monthly Notices of the Royal Astronomical Society, 2003, 345, 949-959.	4.4	8