Mario Ziman

List of Publications by Citations

71 papers	1,619 citations	22 h-index	38 g-index
76 ext. papers	1,880 ext. citations	2.7 avg, IF	4.85 L-index

#	Paper	IF	Citations
71	Thermalizing quantum machines: dissipation and entanglement. *Physical Review Letters*, **2002**, 88, 097905	7.4	187
70	Diluting quantum information: An analysis of information transfer in system-reservoir interactions. *Physical Review A*, **2002**, 65,	2.6	115
69	An invitation to quantum incompatibility. *Journal of Physics A: Mathematical and Theoretical*, **2016**, 49, 123001	2	82
68	Towards quantum-based privacy and voting. *Physics Letters, Section A: General, Atomic and Solid State Physics*, **2006**, 349, 75-81	2.3	82
67	All (qubit) decoherences: Complete characterization and physical implementation. *Physical Review A*, **2005**, 72,	2.6	76
66	Description of Quantum Dynamics of Open Systems Based on Collision-Like Models. *Open Systems and Information Dynamics*, **2005**, 12, 81-91	0.4	76
65	The Mathematical Language of Quantum Theory: From Uncertainty to Entanglement **2011**,		74
64	Simulation of indivisible qubit channels in collision models. *Journal of Physics B: Atomic, Molecular and Optical Physics*, **2012**, 45, 154006	1.3	70
63	Probabilistic implementation of universal quantum processors. *Physical Review A*, **2002**, 65,	2.6	59
62	Divisibility of quantum dynamical maps and collision models. *Physical Review A*, **2017**, 96,	2.6	50
61	Process positive-operator-valued measure: A mathematical framework for the description of process tomography experiments. *Physical Review A*, **2008**, 77,	2.6	44
60	Concurrence versus purity: Influence of local channels on Bell states of two qubits. *Physical Review A*, **2005**, 72,	2.6	43
59	Entanglement, purity, and energy: Two qubits versus two modes. *Physical Review A*, **2006**, 74,	2.6	36
58	Maximally incompatible quantum observables. *Physics Letters, Section A: General, Atomic and Solid State Physics*, **2014**, 378, 1695-1699	2.3	33
57	Toward protocols for quantum-ensured privacy and secure voting. *Physical Review A*, **2011**, 84,	2.6	31
56	Implementation of quantum maps by programmable quantum processors. *Physical Review A*, **2002**, 66,	2.6	30
55	Local two-qubit entanglement-annihilating channels. *Physical Review A*, **2012**, 85,	2.6	28

54	Entanglement-annihilating and entanglement-breaking channels. *Journal of Physics A: Mathematical and Theoretical*, **2010**, 43, 275306	2	27
53	Correlation-assisted quantum communication. *Physical Review A*, **2003**, 67,	2.6	27
52	Entanglement sensitivity to signal attenuation and amplification. *Physical Review A*, **2014**, 90,	2.6	26
51	Approximate programmable quantum processors. *Physical Review A*, **2006**, 73,	2.6	26
50	Dissociation and annihilation of multipartite entanglement structure in dissipative quantum dynamics. *Physical Review A*, **2013**, 88,	2.6	25
49	Optimal Probabilistic Storage and Retrieval of Unitary Channels. *Physical Review Letters*, **2019**, 122, 170502	7.4	19
48	Saturation of Coffman□Kundu□Wootters inequalities via quantum homogenization. *Journal of Optics B: Quantum and Semiclassical Optics*, **2003**, 5, S439-S441		19
47	Realization of positive-operator-valued measures using measurement-assisted programmable quantum processors. *Physical Review A*, **2005**, 72,	2.6	19
46	Bipartite entanglement-annihilating maps: Necessary and sufficient conditions. *Physical Review A*, **2013**, 88,	2.6	17
45	Unambiguous identification of coherent states: Searching a quantum database. *Physical Review A*, **2007**, 76,	2.6	17
44	Entanglement-induced state ordering under local operations. *Physical Review A*, **2006**, 73,	2.6	17
43	Optimal single-shot strategies for discrimination of quantum measurements. *Physical Review A*, **2014**, 90,	2.6	16
42	Unambiguous comparison of ensembles of quantum states. *Physical Review A*, **2008**, 77,	2.6	16
41	Incomplete quantum process tomography and principle of maximal entropy. *Physical Review A*, **2008**, 78,	2.6	15
40	Single-shot discrimination of quantum unitary processes. *Journal of Modern Optics*, **2010**, 57, 253-259	1.1	14
39	Improving the performance of probabilistic programmable quantum processors. *Physical Review A*, **2004**, 69,	2.6	14
38	Incompatible measurements on quantum causal networks. *Physical Review A*, **2016**, 93,	2.6	12
37	Discrimination of quantum observables using limited resources. *Physical Review A*, **2008**, 77,	2.6	12

36	Process reconstruction: From unphysical to physical maps via maximum likelihood. *Physical Review A*, **2005**, 72,	2.6	11
35	Divisibility of qubit channels and dynamical maps. *Quantum - the Open Journal for Quantum Science* ,3, 144		11
34	Programmable Quantum Gate Arrays. *Fortschritte Der Physik*, **2001**, 49, 987	5.7	10
33	Programmable Quantum Processors. *Quantum Information Processing*, **2006**, 5, 313-420	1.6	9
32	Unambiguous comparison of unitary channels. *Physical Review A*, **2009**, 79,	2.6	8
31	Unambiguous comparison of quantum measurements. *Physical Review A*, **2009**, 80,	2.6	8
30	Optimal entanglement-assisted discrimination of quantum measurements. *Physical Review A*, **2014**, 90,	2.6	7
29	Distance to boundary and minimum-error discrimination. *Physical Review A*, **2014**, 89,	2.6	7
28	Approximating incompatible von Neumann measurements simultaneously. *Physical Review A*, **2010**, 82,	2.6	7
27	Coexistence of quantum operations. *Journal of Physics A: Mathematical and Theoretical*, **2009**, 42, 365302	2	7
26	Unambiguous identification of coherent states. II. Multiple resources. *Physical Review A*, **2009**, 79,	2.6	6
25	Optimality of private quantum channels. *Journal of Physics A: Mathematical and Theoretical*, **2007**, 40, 5415-5426	2	6
24	Equally distant, partially entangled alphabet states for quantum channels. *Physical Review A*, **2000**, 62,	2.6	6
23	Incompatibility of unbiased qubit observables and Pauli channels. *Physical Review A*, **2018**, 97,	2.6	4
22	Two notes on Grover search: Programming and discriminating. *European Physical Journal Plus*, **2014**, 129, 1	3.1	4
21	Exploring boundaries of quantum convex structures: Special role of unitary processes. *Physical Review A*, **2015**, 92,	2.6	4
20	When non-Gaussian states are Gaussian: Generalization of nonseparability criterion for continuous variables. *Physical Review A*, **2006**, 74,	2.6	4
19	Reconstruction of Superoperators from Incomplete Measurements. *Foundations of Physics*, **2006**, 36, 127-156	1.2	4

18	REALIZATION OF UNITARY MAPS VIA PROBABILISTIC PROGRAMMABLE QUANTUM PROCESSORS. *International Journal of Quantum Information*, **2003**, 01, 527-541	0.8	4
17	Process reconstruction from incomplete and/or inconsistent data. *European Physical Journal D*, **2005**, 32, 215-222	1.3	4
16	Open system dynamics of simple collision models **2010**,		4
15	Popescu-Rohrlich box implementation in general probabilistic theory of processes. *Physics Letters, Section A: General, Atomic and Solid State Physics*, **2020**, 384, 126323	2.3	3
14	Repeatable quantum memory channels. *Physical Review A*, **2008**, 78,	2.6	3
13	On the Local Unitary Equivalence of States of Multi-partite Systems. *Fortschritte Der Physik*, **2001**, 49, 1123	5.7	3
12	Process estimation in the presence of time-invariant memory effects. *Physical Review A*, **2015**, 92,	2.6	2
11	Probability-based comparison of quantum states. *Physical Review A*, **2012**, 85,	2.6	2
10	Probabilistic programmable quantum processors. *Fortschritte Der Physik*, **2004**, 52, 1056-1063	5.7	2
9	Microscopic description of information transfer from a qudit to reservoir. *Fortschritte Der Physik*, **2003**, 51, 280-287	5.7	2
8	Publisher's Note: Realization of positive-operator-valued measures using measurement-assisted programmable quantum processors [Phys. Rev. 72, 022343 (2005)]. *Physical Review A*, **2005**, 72,	2.6	2
7	Probabilistic storage and retrieval of qubit phase gates. *Physical Review A*, **2020**, 102,	2.6	2
6	Quantum finite-depth memory channels: Case study. *Physical Review A*, **2009**, 80,	2.6	1
5	Direct estimation of decoherence rates. *Physical Review A*, **2012**, 86,	2.6	1
4	Equivalent programmable quantum processors. *Optics Communications*, **2010**, 283, 822-826	2	1
3	Universality and optimality of programmable quantum processors. *Acta Physica Hungarica A Heavy Ion Physics*, **2006**, 26, 277-291		0
2	Estimation of Potentially Unphysical Maps. *Open Systems and Information Dynamics*, **2006**, 13, 255-262	0.4	
1	Quantum Memory Channels in Quantum Optics **2012**, 533-552		