

# Renate Loll

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/164553/publications.pdf>

Version: 2024-02-01

62  
papers

3,904  
citations

186265

28  
h-index

155660

55  
g-index

62  
all docs

62  
docs citations

62  
times ranked

637  
citing authors

#	ARTICLE	IF	CITATIONS
1	Curvature profiles for quantum gravity. Physical Review D, 2021, 103, .	4.7	6
2	Geometric flux formula for the gravitational Wilson loop. Classical and Quantum Gravity, 2021, 38, 075011.	4.0	3
3	Quantum flatness in two-dimensional quantum gravity. Physical Review D, 2021, 104, .	4.7	6
4	Renormalization in Quantum Theories of Geometry. Frontiers in Physics, 2020, 8, .	2.1	19
5	Quantum gravity from causal dynamical triangulations: a review. Classical and Quantum Gravity, 2020, 37, 013002.	4.0	179
6	How round is the quantum de Sitter universe?. European Physical Journal C, 2020, 80, 1.	3.9	18
7	Introducing quantum Ricci curvature. Physical Review D, 2018, 97, .	4.7	29
8	Implementing quantum Ricci curvature. Physical Review D, 2018, 97, .	4.7	24
9	Spherically symmetric solutions of the $\hat{R}$ equation. Physical Review D, 2017, 96, .	4.7	24
10	CDT and cosmology. Comptes Rendus Physique, 2017, 18, 265-274.	0.9	12
11	Characteristics of the new phase in CDT. European Physical Journal C, 2017, 77, 152.	3.9	28
12	Wilson loops in nonperturbative quantum gravity. Physical Review D, 2015, 92, .	4.7	9
13	Locally causal dynamical triangulations in two dimensions. Physical Review D, 2015, 92, .	4.7	10
14	CAUSAL DYNAMICAL TRIANGULATIONS AND THE SEARCH FOR A THEORY OF QUANTUM GRAVITY. , 2015, , .		1
15	Role of the extra coupling in the kinetic term in Hoava-Lifshitz gravity. Physical Review D, 2014, 90, .	4.7	16
16	Renormalization group flow in CDT. Classical and Quantum Gravity, 2014, 31, 165003.	4.0	51
17	Quantum Gravity via Causal Dynamical Triangulations. , 2014, , 723-741.		14
18	Causal Dynamical Triangulations without preferred foliation. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2013, 724, 155-159.	4.1	36

#	ARTICLE	IF	CITATIONS
19	Exploring torus universes in causal dynamical triangulations. Physical Review D, 2013, 88, .	4.7	10
20	De Sitter universe from causal dynamical triangulations without preferred foliation. Physical Review D, 2013, 88, .	4.7	24
21	CAUSAL DYNAMICAL TRIANGULATIONS AND THE SEARCH FOR A THEORY OF QUANTUM GRAVITY. International Journal of Modern Physics D, 2013, 22, 1330019.	2.1	18
22	The transfer matrix in four dimensional causal dynamical triangulations. , 2013, , .		3
23	Quantum spacetime, from a practitioner's point of view. , 2013, , .		3
24	Causal dynamical triangulations and the quest for quantum gravity. , 2012, , 321-337.		10
25	Second- and first-order phase transitions in causal dynamical triangulations. Physical Review D, 2012, 85, .	4.7	61
26	Nonperturbative quantum gravity. Physics Reports, 2012, 519, 127-210.	25.6	312
27	The semiclassical limit of causal dynamical triangulations. Nuclear Physics B, 2011, 849, 144-165.	2.5	60
28	Second-Order Phase Transition in Causal Dynamical Triangulations. Physical Review Letters, 2011, 107, 211303.	7.8	93
29	Deriving spacetime from first principles. Annalen Der Physik, 2010, 19, 186-195.	2.4	8
30	CDT meets Hořava-Lifshitz gravity. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2010, 690, 413-419.	4.1	76
31	Geometry of the quantum universe. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2010, 690, 420-426.	4.1	26
32	Coupling a point-like mass to quantum gravity with causal dynamical triangulations. Classical and Quantum Gravity, 2010, 27, 185025.	4.0	8
33	Shaken, but not stirred—Potts model coupled to quantum gravity. Nuclear Physics B, 2009, 807, 251-264.	2.5	27
34	Quantum Gravity: the art of building spacetime. , 2009, , 341-359.		19
35	The emergence of spacetime or quantum gravity on your desktop. Classical and Quantum Gravity, 2008, 25, 114006.	4.0	54
36	Nonperturbative quantum de Sitter universe. Physical Review D, 2008, 78, .	4.7	106

#	ARTICLE	IF	CITATIONS
37	A string field theory based on causal dynamical triangulations. Journal of High Energy Physics, 2008, 2008, 032-032.	4.7	40
38	Planckian Birth of a Quantum de Sitter Universe. Physical Review Letters, 2008, 100, 091304.	7.8	116
39	THE EMERGENCE OF (EUCLIDEAN) DE SITTER SPACE-TIME. , 2008, , .		3
40	Putting a cap on causality violations in causal dynamical triangulations. Journal of High Energy Physics, 2007, 2007, 017-017.	4.7	9
41	(2+1)-dimensional quantum gravity as the continuum limit of causal dynamical triangulations. Physical Review D, 2007, 76, .	4.7	20
42	Quantum gravity and matter: counting graphs on causal dynamical triangulations. General Relativity and Gravitation, 2007, 39, 863-898.	2.0	15
43	The universe from scratch. Contemporary Physics, 2006, 47, 103-117.	1.8	95
44	Nonperturbative sum over topologies in 2D Lorentzian quantum gravity. AIP Conference Proceedings, 2006, , .	0.4	1
45	Counting a black hole in Lorentzian product triangulations. Classical and Quantum Gravity, 2006, 23, 3849-3878.	4.0	27
46	Semiclassical universe from first principles. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2005, 607, 205-213.	4.1	96
47	The Spectral Dimension of the Universe is Scale Dependent. Physical Review Letters, 2005, 95, 171301.	7.8	380
48	Reconstructing the Universe. Physical Review D, 2005, 72, .	4.7	276
49	Emergence of a 4D World from Causal Quantum Gravity. Physical Review Letters, 2004, 93, 131301.	7.8	301
50	Nonperturbative 3D Lorentzian quantum gravity. Physical Review D, 2001, 64, .	4.7	80
51	A proper-time cure for the conformal sickness in quantum gravity. Nuclear Physics B, 2001, 606, 357-379.	2.5	64
52	Dynamically triangulating Lorentzian quantum gravity. Nuclear Physics B, 2001, 610, 347-382.	2.5	203
53	Discrete Lorentzian quantum gravity. Nuclear Physics, Section B, Proceedings Supplements, 2001, 94, 96-107.	0.4	60
54	The relation between Euclidean and Lorentzian 2D quantum gravity. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2000, 475, 24-32.	4.1	35

#	ARTICLE	IF	CITATIONS
55	Nonperturbative Lorentzian Path Integral for Gravity. Physical Review Letters, 2000, 85, 924-927.	7.8	149
56	Crossing the $c=1$ barrier in 2D Lorentzian quantum gravity. Physical Review D, 2000, 61, .	4.7	34
57	New perspective on matter coupling in 2D quantum gravity. Physical Review D, 1999, 60, .	4.7	50
58	Euclidean and Lorentzian quantum gravity – lessons from two dimensions. Chaos, Solitons and Fractals, 1999, 10, 177-195.	5.1	33
59	Non-perturbative Lorentzian quantum gravity, causality and topology change. Nuclear Physics B, 1998, 536, 407-434.	2.5	261
60	Discrete Approaches to Quantum Gravity in Four Dimensions. Living Reviews in Relativity, 1998, 1, 13.	26.7	142
61	New loop representations for 2+1 gravity. Classical and Quantum Gravity, 1994, 11, 2417-2434.	4.0	22
62	Loop approaches to gauge field theories. Theoretical and Mathematical Physics (Russian Federation), 1992, 93, 1415-1432.	0.9	9