Luis Roca

List of Publications by Year
in descending order

108 papers	2,303 citations	159585 30 h-index	223800 46 g-index
110 all docs	110 docs citations	110 times ranked	775 citing authors

#	Article	IF	Citations
1	Inconsistency of the data on the K1(1270)â†'ÏۥK0âŽ(1430) decay width. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2022, 824, 136827.	4.1	1
2	Masses and widths of the exotic molecular <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msubsup><mml:mi>B</mml:mi><mml:mrow><mml:mo stretchy="false">(</mml:mo><mml:mi>s</mml:mi><mml:mo) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 697 Td (stretchy="false">)</mml:mo stretchy="false">(</mml:mo><mml:mo>*</mml:mo><mml:mo) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 677 Td (stretchy="false">)</mml:m	4.7	19
3	Scalar resonances in the D+â†'Kâˆ'K+K+ decay. Physical Review D, 2021, 103, .	4.7	13
4	Unveiling the <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msub><mml:mi>K</mml:mi><mml:mn>1</mml:mn></mml:msub><mml:mo stretchy="false">(</mml:mo><mml:mn>1270</mml:mn><mml:mo) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 627 Td (stretchy="false">)</m xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mover accent="true"><mml:mi>B</mml:mi><mml:mo stretchy="false">Â¯</mml:mo></mml:mover><mml:mo stret	4.7	17
5	Few-Body Systems Consisting of Mesons. Few-Body Systems, 2020, 61, 1.	1.5	19
6	Tau decay into $$u _au $$ and $$a_1(1260)$$, $$b_1(1235)$$, and two $$K_1(1270)$$. European Physical Journal C, 2020, 80, 1.	3.9	4
7	Signatures of the two $$K_1(1270)$$ poles in $$D^+ightarrow u e^+ V P$$ decay. European Physical Journal C, 2020, 80, 1.	3.9	8
8	Discerning the two K1(1270) poles in D0â†'Ï€+VP decay. Physical Review D, 2019, 100, .	4.7	12
9	<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>Ï„</mml:mi></mml:math> decay into a pseudoscalar and an axial-vector meson. Physical Review D, 2019, 99, .	4.7	13
10	Recent Developments in Chiral Unitary Theory and Triangle Singularities Involving Baryons. Few-Body Systems, 2018, 59, 1.	1.5	1
11	Triangle mechanism in Ï„â€¯â†'â€¯f1(1285)Ï€Î½ decay. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2018, 782, 332-338.	4.1	15
12	Prediction of new states from <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:msup><mml:mrow><mml:mi>D</mml:mi></mml:mrow><mml:mrow><mml:mo stretchy="false">(</mml:mo><mml:mo>*</mml:mo><mml:mo) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 307 Td (stretchy="false">)</mml:r stretchy="false">(</mml:mo><mml:mo>*</mml:mo><mml:mo) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 287 Td (stretchy="false">)</mml:r accent="	4.7	7
13	Role of a triangle singularity in the Ï€Î” decay of N(1700)(3/2âˆ'). Physical Review C, 2017, 95, .	2.9	18
14	Binding of the <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:mi>B</mml:mi><mml:mi>D</mml:mi><mml:mover accent="true"><mml:mrow><mml:mi>D</mml:mi></mml:mrow><mml:mrow><mml:mo stretchy="false">Â¯</mml:mo></mml:mrow></mml:mover></mml:mrow></mml:math> and <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>B</mml:mi> ... systems.	4.7	18
15	xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>D</mml:mi> stretchy="false">(</mml:mo><mml:msup><mml:mi>B</mml:mi><mml:mo>*</mml:mo></mml:msup><mml:mo) Tj ETQq1 1 0.78431 stretchy="false">(</mml:mo><mml:msup><mml:mi>D</mml:mi><mml:mo>*</mml:mo></mml:msup><mml:mo) Tj ETQq1 1 0.78431 xmlns:mml="http://www.w3.org/1998/Math/M	4.7	41
16	On the Double Pole Structure of the Î›(1405). , 2017, , .		1
17	Predictions for pentaquark states of hidden charm molecular nature and comparison with experiment. EPJ Web of Conferences, 2016, 130, 06004.	0.3	0
18	The Î›b â†' J/ÏˆKâˆ' p reaction: Î›(1405) and hidden charm pentaquark formation. AIP Conference Proceedings, 2016, , .	0.4	0

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19	Study of reactions disclosing hidden charm pentaquarks with or without strangeness. Nuclear Physics A, 2016, 954, 371-392.	1.5	18
20	On the hidden charm pentaquarks in $$Lambda _b ightarrow J/psi K^- p$$ Î› b â†’ J / Ï^ K - p decay. European Physical Journal C, 2016, 76, 1.	3.9	16
21	Weak decays of heavy hadrons into dynamically generated resonances. International Journal of Modern Physics E, 2016, 25, 1630001.	1.0	100
22	Two-, Three-, Many-body Systems Involving Mesons. Multimeson Condensates. Acta Physica Polonica B, 2016, 47, 357.	0.8	3
23	Reactions Looking for Hidden Charm Pentaquarks With or Without Strangeness. Acta Physica Polonica B, Proceedings Supplement, 2016, 9, 529.	0.1	0
24	LHCb pentaquark as a<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:msup><mml:mrow><mml:mover accent="true"><mml:mrow><mml:mi>D</mml:mi></mml:mrow><mml:mrow><mml:mo stretchy="false">Â¯</mml:mo></mml:mrow></mml:mover></mml:mrow><mml:mrow><mml:mo>*</mml:mo></mml:mrow></mml:msup mathvariant="normal">Î£</mml:mi></mml:mrow><mml:mrow><mml:mi>c</mml:mi></mml:mrow></mml:msub><mml:mo>â^’</mml:mo accent="true"><mml:mrow><m. Physical Review D, 2015, 92, .	4.7	185
25	The two Î›(1405) poles from photoproduction data. EPJ Web of Conferences, 2015, 97, 00023.	0.3	2
26	Predictions for the $${varvec{Lambda }_b ightarrow J/psi ~ Lambda (1405)}$$ Î› b â†’ J / Ï^ Î› (1405) decay. European Physical Journal C, 2015, 75, 218.	3.9	52
27	Composite nature of the<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:mrow><mml:mi>Î›</mml:mi><mml:mo>(</mml:mo><mml:mn>1520</mml:mn> Physical Review C, 2014, 90, .	2.9	15
28	EXTRACTION OF THE Î›(1405) POLES FROM Ï€0Î£0 PHOTOPRODUCTION DATA. International Journal of Modern Physics Conference Series, 2014, 26, 1460086.	0.7	0
29	<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:mi>Î›</mml:mi><mml:mo>(</mml:mo><mml:mn>1405</mml:mn><mml:mo>)</mml:mo></mml: obtained from<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:msup><mml:mi>Ï€</mml:mi><mml:mn>0</mml:mn></mml:msup><mml:msup><mml:mi>Î£</mml:mi> data. Physical Review C, 2013, 87, .	2.9	59
30	Isospin 0 and 1 resonances from<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:mi>Ï€</mml:mi><mml:mi>Î£</mml:mi></mml:mrow></mml:math>photoproduction data. Physical Review C, 2013, 88, .	2.9	58
31	Isospin violation inJ/Ï¨â†’Ï•Ï€0Î·decay and thef0â^’a0mixing. Physical Review D, 2013, 88, .	4.7	29
32	Momentum dependence of the<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>Ï†</mml:mi></mml:math>-meson nuclear transparency. Physical Review C, 2012, 85, .	2.9	34
33	Scattering of unstable particles in a finite volume: The case of<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>Ï€</mml:mi><mml:mi>Ï</mml:mi></mml:math>scattering and the<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msub><mml:mi>a</mml:mi><mml:mn>1</mml:mn></mml:msub><mml:mo stretchy="false">(</mml:mo><mml:mn>1260</mml:mn><mml:mo) Tj ETQq1 1 0.784314 rgBT /Overlock 10 Tf 50 157 Td (stretchy="fal	4.7	42
34	Finite volume treatment of Ï€Ï€ scattering and limits to phase shifts extraction from lattice QCD. Journal of High Energy Physics, 2012, 2012, 1.	4.7	24
35	Recent results onppâ†’ppÏ•/K+Kâ^’production and the momentum dependence ofÏ•-meson nuclear transparency. EPJ Web of Conferences, 2012, 36, 00011.	0.3	0
36	In-mediumÏ•meson width extracted from proton-nucleus collisions. EPJ Web of Conferences, 2012, 37, 08009.	0.3	1

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37	Momentum dependence of hadronic production of the Ï•-meson and its width in nuclear matter. Hyperfine Interactions, 2012, 210, 59-63.	0.5	0
38	Two, three, many body systems involving mesons. Progress in Particle and Nuclear Physics, 2012, 67, 455-460.	14.4	4
39	Selected topics on Hadrons in Nuclei. Journal of Physics: Conference Series, 2011, 312, 022006.	0.4	0
40	Three Body Systems with Strangeness and Exotic Systems. Few-Body Systems, 2011, 50, 129-135.	1.5	0
41	Hadronic Particles made of Multi-Ï(770) Mesons. Few-Body Systems, 2011, 50, 191-194.	1.5	0
42	Scalar-Pseudoscalar scattering and pseudoscalar resonances. , 2011, , .		1
43	Pseudotensor mesons as three-body resonances. Physical Review D, 2011, 84, .	4.7	13
44	Hadronic particles made of multi-Ï(770) mesons. , 2011, , .		0
45	Momentum dependence of hadronic production of the Ï•-meson and its width in nuclear matter. , 2011, , 209-213.		0
46	Hadron resonances generated from the dynamics of the lightest scalar ones. Nuclear Physics, Section B, Proceedings Supplements, 2010, 207-208, 188-191.	0.4	0
47	The a1(1260) as a ÂÂ Resonance in Nuclear Matter. Progress of Theoretical Physics, 2010, 123, 719-742.	2.0	4
48	Axial-vector resonance in nuclear matter. , 2010, , .		0
49	Dynamical generation of pseudoscalar resonances. Physical Review D, 2010, 82, .	4.7	41
50	Nature of the<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msubsup><mml:mi>K</mml:mi><mml:mn>2</mml:mn><mml:mo>*</mml:mo></mml:msubsup><mml:mo stretchy="false">(</mml:mo><mml:mn>1430</mml:mn><mml:mo) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 222 Td (stretchy="false">)</m Description: f the<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msubsup><mml:mi>f</mml:mi><mml:mn>2</mml:mn></mml:msubsup><mml:mo stretchy="false">(</mml:mo><mml:mn>1270</mml:mn><mml:mo) Tj ETQq1 1 0.784314 rgBT /Overlock 10 Tf 50 187 Td (stretchy=" ai xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msub><mml:mi>Ï€</mml:mi><mml:mn>3</mml:mn></mml:msub><mml:mo stretchy="	4.7	32
51		4.7	63
52	Asymmetry observables ine+eâ^'â†'Ï€+Ï€â^'Î³in theÏ•region within a chiral unitary approach. Physical Review D, 2010, 81, .	4.7	1
53	Beam-Helicity Asymmetries in Double-Pion Photoproduction off the Proton. Physical Review Letters, 2009, 103, 052002.	7.8	30
54	Nature of the axial-vector mesons from their Nc behavior within the chiral unitary approach. European Physical Journal A, 2009, 39, 81-87.	2.5	35

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55	Hidden gauge formalism for the radiative decays of axial-vector mesons. Physical Review D, 2009, 79, .	4.7	106
56	CHIRAL UNITARY DYNAMICS OF HADRONS AND HADRONS IN A NUCLEAR MEDIUM. International Journal of Modern Physics E, 2009, 18, 1389-1403.	1.0	8
57	Improved dispersion relations for <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" altimg="si1.gif" overflow="scroll"><mml:mi>Î³</mml:mi><mml:mi>Î³</mml:mi><mml:mo>â†’</mml:mo><mml:msup><mml:mi>Ï€</mml:mi><mml:mr Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2008, 659, 201-208.	4.1	47
58	On the nature of the and from their behavior in chiral dynamics. Nuclear Physics A, 2008, 809, 65-87.	1.5	33
59	Meson loops in the f0(980) and a0(980) radiative decays into Ï•, Ï‰. European Physical Journal A, 2008, 36, 73-84.	2.5	31
60	Two photons into Ï€0Ï€0. European Physical Journal A, 2008, 37, 15-32.	2.5	35
61	Radiative decay intoÎ³Pof the low lying axial-vector mesons. Physical Review D, 2008, 77, .	4.7	12
62	Structure of theÎ›(1405)baryon resonance from its largeNcbehavior. Physical Review D, 2008, 77, .	4.7	32
63	Role of meson loops in the<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msub><mml:mi>f</mml:mi><mml:mn>0</mml:mn></mml:msub><mml:mo stretchy="false">(</mml:mo><mml:mn>1370</mml:mn><mml:mo) Tj ETQq1 1 0.784314 rgBT /Overlock 10 Tf 50 427 Td (stretchy="a xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msub><mml:mi>f</mml:mi><mml:mn>0</mml:mn></mml:msub><mml:mo	4.7	11
64	<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>Î·</mml:mi><mml:mo>â†’</mml:mo><mml:msup><mml:mi>Ï€</mml:mi><mml:mn>0</mml:mn></mml:mn></mml:msup within a chiral unitary approach revisited. Physical Review D, 2008, 77, .	4.7	15
65	RECENT DEVELOPMENTS IN CHIRAL UNITARY DYNAMICS OF RESONANCES. Modern Physics Letters A, 2008, 23, 2201-2208.	1.2	1
66	Î›(1405) IN CHIRAL SU(3) DYNAMICS. Modern Physics Letters A, 2008, 23, 2393-2396.	1.2	4
67	S-wave Î³Î³â†’Ï€Ï€ and f[sub 0](980)â†’Ï€Ï€. AIP Conference Proceedings, 2008, , .	0.4	1
68	Recent Developments in Chiral Dynamics of Hadrons and Hadrons in Nuclei. Progress of Theoretical Physics Supplement, 2007, 168, 543-551.	0.1	0
69	Clues for the existence of twoK1(1270)resonances. Physical Review D, 2007, 75, .	4.7	57
70	Recent developments in chiral dynamics of hadrons and hadrons in a nuclear medium. Nuclear Physics A, 2007, 782, 259-266.	1.5	1
71	Scalar radius of the pion and zeros in the form factor. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2007, 651, 139-146.	4.1	36
72	Quantum loops in radiative decays of the <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" altimg="si1.gif" overflow="scroll"><mml:msub><mml:mi>a</mml:mi><mml:mn>1</mml:mn></mml:msub></mml:math> and <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" altimg="si2.gif" overflow="scroll"><mml:msub><mml:mi>b</mml:mi><mml:mn>1</mml:mn></mml:msub></mml:math> axial-vector mesons. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics,	4.1	21

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73	Pseudoscalar meson masses in unitarized chiral perturbation theory. European Physical Journal A, 2007, 31, 534-536.	2.5	1
74	Non-perturbative study of the light pseudoscalar masses in chiral dynamics. European Physical Journal A, 2007, 34, 371-386.	2.5	10
75	Pseudoscalar meson masses in unitarized chiral perturbation theory. , 2007, , 171-173.		0
76	Chiral Dynamics of Hadrons in Nuclei. Acta Physica Hungarica A Heavy Ion Physics, 2006, 27, 115-124.	0.4	4
77	Testing the nature of the Î›(1520)-resonance in proton-induced production. European Physical Journal A, 2006, 27, 373-380.	2.5	11
78	A-dependence of the Î³- and p-induced production of the Î›(1520) from nuclei. European Physical Journal A, 2006, 28, 139-145.	2.5	24
79	Chiral dynamics of baryon resonances and hadrons in a nuclear medium. Pramana - Journal of Physics, 2006, 66, 731-752.	1.8	8
80	Unitary chiral dynamics in J/Î¨ decay into VPP and the role of the scalar mesons. AIP Conference Proceedings, 2006, , .	0.4	0
81	Unitary coupled channel study of the Î›(1520) resonance. AIP Conference Proceedings, 2006, , .	0.4	0
82	The low lying axial-vector mesons as dynamically generated resonances. AIP Conference Proceedings, 2006, , .	0.4	2
83	Chiral dynamics of the Î›(1520) in coupled channels tested in the Kâ¯p â†' Ï€Ï€Î› reaction. AIP Conference Proceedings, 2006, , .	0.4	0
84	Unitary coupled channel analysis of theÎ›(1520)resonance. Physical Review C, 2006, 73, .	2.9	53
85	Measuring the Ï• meson width in the medium from p induced Ï• production in nuclei. Nuclear Physics A, 2005, 755, 495-498.	1.5	3
86	Helicity asymmetries in double pion photoproduction on the proton. Nuclear Physics A, 2005, 748, 192-205.	1.5	17
87	Effects of the doping and the number of planes on the shadow bands of Bi-based cuprates. European Physical Journal B, 2005, 46, 309-314.	1.5	5
88	Ï• meson width in the medium from proton induced Ï• production in nuclei. Physical Review C, 2005, 71, .	2.9	48
89	Polarization effects in photoemission disentangle the origin of the shadow bands in Bi-based superconductors. Physical Review B, 2005, 72, .	3.2	1
90	Low lying axial-vector mesons as dynamically generated resonances. Physical Review D, 2005, 72, .	4.7	204

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91	RADIATIVE VECTOR MESON DECAY. International Journal of Modern Physics A, 2005, 20, 1901-1904.	1.5	0
92	UNITARY CHIRAL DYNAMICS IN J/Î¨ DECAYS INTO VPP AND THE ROLE OF THE SCALAR MESONS. International Journal of Modern Physics A, 2005, 20, 1897-1900.	1.5	2
93	New contributions to Ï† â†' Ï€0Ï€0Î³ and Ï† â†' Ï€0Î·Î³ decays. AIP Conference Proceedings, 2004, , .	0.4	0
94	Decay of axial-vector mesons into VP andPÎ³. Physical Review D, 2004, 70, .	4.7	32
95	Î· â†' Ï€0Î³Î³ decay within a chiral unitary approach. AIP Conference Proceedings, 2004, , .	0.4	1
96	Mass dependence of inclusive nuclear Ï† photoproduction. Nuclear Physics A, 2004, 733, 130-141.	1.5	75
97	Unitary chiral dynamics in decays and the role of scalar mesons. Nuclear Physics A, 2004, 744, 127-155.	1.5	57
98	Photon energy and polarization dependence of the Fermi surface in optimally doped Bi2Sr2CaCu2O8+Î´ superconductors. Journal of Electron Spectroscopy and Related Phenomena, 2004, 137-140, 657-661.	1.7	0
99	Sequential vector and axial-vector meson exchange and chiral loops in radiative phi decay. Nuclear Physics A, 2003, 729, 743-768.	1.5	46
100	Medium Ïƒ meson effects in Ï€0Ï€0 photoproduction. Progress in Particle and Nuclear Physics, 2003, 50, 649-658.	14.4	1
101	Mass and width of the Ïƒ meson at finite density. Nuclear Physics A, 2003, 721, C301-C304.	1.5	5
102	The (Ï€âˆ',Î³Î³) reaction in nuclei and the Ïƒ meson inÂthe medium. Nuclear Physics A, 2003, 723, 129-144.	1.5	3
103	Î´ meson in a nuclear medium through two pion photoproduction. Nuclear Physics A, 2003, 721, C719-C722.	1.5	2
104	Matrix element effects on the Fermi surface mapping by angle resolved photoemission from Bi2Sr2CaCu2O8+ superconductors. Applied Surface Science, 2003, 212-213, 62-66.	6.1	5
105	Î·â†'Ï€0Î³Î³decay within a chiral unitary approach. Physical Review D, 2003, 67, .	4.7	40
106	THEORETICAL STUDY OF POLARIZATION OBSERVABLES IN DOUBLE PION PHOTOPRODUCTION ON THE PROTON. , 2003, , .		0
107	The Ïƒ meson in a nuclear medium through two pion photoproduction. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2002, 541, 77-86.	4.1	52
108	The role of Î"(1700) excitation and Ï•production in double pion photoproduction. Nuclear Physics A, 2001, 695, 295-327.	1.5	58