Louis E Strigari

List of Publications by Year
in descending order

106 papers	8,752 citations	53794 45 h-index	42399 92 g-index
106 all docs	106 docs citations	106 times ranked	8844 citing authors

#	Article	IF	Citations
1	Searching for Dark Matter Annihilation from MilkyÂWay Dwarf Spheroidal Galaxies with Six Years of Fermi Large Area Telescope Data. Physical Review Letters, 2015, 115, 231301.	7.8	881
2	Constraining Dark Matter Models from a Combined Analysis of Milky Way Satellites with the Fermi Large Area Telescope. Physical Review Letters, 2011, 107, 241302.	7.8	465
3	Implication of neutrino backgrounds on the reach of next generation dark matter direct detection experiments. Physical Review D, 2014, 89, .	4.7	429
4	A common mass scale for satellite galaxies of the Milky Way. Nature, 2008, 454, 1096-1097.	27.8	424
5	SEARCHING FOR DARK MATTER ANNIHILATION IN RECENTLY DISCOVERED MILKY WAY SATELLITES WITH FERMI-LAT. Astrophysical Journal, 2017, 834, 110.	4.5	412
6	Dark matter constraints from observations of 25 MilkyÂWay satellite galaxies with the Fermi Large Area Telescope. Physical Review D, 2014, 89, .	4.7	360
7	Hundreds of Milky Way Satellites? Luminosity Bias in the Satellite Luminosity Function. Astrophysical Journal, 2008, 688, 277-289.	4.5	329
8	A COMPLETE SPECTROSCOPIC SURVEY OF THE MILKY WAY SATELLITE SEGUE 1: THE DARKEST GALAXY. Astrophysical Journal, 2011, 733, 46.	4.5	244
9	Galactic searches for dark matter. Physics Reports, 2013, 531, 1-88.	25.6	235
10	Stellar Streams Discovered in the Dark Energy Survey. Astrophysical Journal, 2018, 862, 114.	4.5	193
11	THE LEAST-LUMINOUS GALAXY: SPECTROSCOPY OF THE MILKY WAY SATELLITE SEGUE 1. Astrophysical Journal, 2009, 692, 1464-1475.	4.5	186
12	Redefining the Missing Satellites Problem. Astrophysical Journal, 2007, 669, 676-683.	4.5	185
13	Precise constraints on the dark matter content of MilkyÂWay dwarf galaxies for gamma-ray experiments. Physical Review D, 2007, 75, .	4.7	157
14	The Most Darkâ€Matterâ€“dominated Galaxies: Predicted Gammaâ€Ray Signals from the Faintest Milky Way Dwarfs. Astrophysical Journal, 2008, 678, 614-620.	4.5	151
15	Taking the Measure of the Universe: Precision Astrometry withSIM PlanetQuest. Publications of the Astronomical Society of the Pacific, 2008, 120, 38-88.	3.1	142
16	STELLAR KINEMATICS AND METALLICITIES IN THE ULTRA-FAINT DWARF GALAXY RETICULUM II. Astrophysical Journal, 2015, 808, 95.	4.5	132
17	SEARCH FOR GAMMA-RAY EMISSION FROM DES DWARF SPHEROIDAL GALAXY CANDIDATES WITH FERMI -LAT DATA. Astrophysical Journal Letters, 2015, 809, L4.	8.3	131
18	SEARCH FOR DARK MATTER SATELLITES USINGFERMI-LAT. Astrophysical Journal, 2012, 747, 121.	4.5	130

#	Article	IF	Citations
19	Neutrino coherent scattering rates at direct dark matter detectors. New Journal of Physics, 2009, 11, 105011.	2.9	129
20	Farthest Neighbor: The Distant Milky Way Satellite Eridanus II*. Astrophysical Journal, 2017, 838, 8.	4.5	119
21	WILLMAN 1â€”A PROBABLE DWARF GALAXY WITH AN IRREGULAR KINEMATIC DISTRIBUTION. Astronomical Journal, 2011, 142, 128.	4.7	118
22	Kinematics of Milky Way satellites in a Lambda cold dark matter universe. Monthly Notices of the Royal Astronomical Society, 2010, 408, 2364-2372.	4.4	116
23	Indirect Dark Matter detection from Dwarf satellites: joint expectations from astrophysics and supersymmetry. Journal of Cosmology and Astroparticle Physics, 2009, 2009, 014-014.	5.4	113
24	Dark matter at the end of the Galaxy. Physical Review D, 2011, 83, .	4.7	104
25	Bounds on cross sections and lifetimes for dark matter annihilation and decay into charged leptons from gamma-ray observations of dwarf galaxies. Physical Review D, 2009, 80, .	4.7	96
26	THE IMPACT OF INHOMOGENEOUS REIONIZATION ON THE SATELLITE GALAXY POPULATION OF THE MILKY WAY. Astrophysical Journal, 2010, 710, 408-420.	4.5	93
27	HALO-TO-HALO SIMILARITY AND SCATTER IN THE VELOCITY DISTRIBUTION OF DARK MATTER. Astrophysical Journal, 2013, 764, 35.	4.5	90
28	21Âcm limits on decaying dark matter and primordial black holes. Physical Review D, 2018, 98, .	4.7	89
29	Nearest Neighbor: The Low-mass Milky Way Satellite Tucana III*. Astrophysical Journal, 2017, 838, 11.	4.5	83
30	Complementarity of dark matter direct detection targets. Physical Review D, 2011, 83, .	4.7	82
31	Reconstructing WIMP properties in direct detection experiments including galactic dark matter distribution uncertainties. Journal of Cosmology and Astroparticle Physics, 2009, 2009, 019-019.	5.4	80
32	A Suzaku search for dark matter emission lines in the X-ray brightest galaxy clusters. Monthly Notices of the Royal Astronomical Society, 2015, 451, 2447-2461.	4.4	80
33	A Large Dark Matter Core in the Fornax Dwarf Spheroidal Galaxy?. Astrophysical Journal, 2006, 652, 306-312.	4.5	78
34	Planck constraint on relic primordial black holes. Physical Review D, 2017, 95, .	4.7	72
35	Nomads of the Galaxy. Monthly Notices of the Royal Astronomical Society, 2012, 423, 1856-1865.	4.4	71
36	Coherent elastic neutrino nucleus scattering as a probe of a<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>Z</mml:mi><mml:mo>â€²</mml:mo></mml:math>through kinetic and mass mixing effects. Physical Review D, 2018, 98, .	4.7	70

#	Article	IF	Citations
37	Determining the Nature of Dark Matter with Astrometry. Astrophysical Journal, 2007, 657, L1-L4.	4.5	67
38	Cosmological simulations of decaying dark matter: implications for small-scale structure of dark matter haloes. Monthly Notices of the Royal Astronomical Society, 2014, 445, 614-629.	4.4	61
39	Readout strategies for directional dark matter detection beyond the neutrino background. Physical Review D, 2015, 92, .	4.7	59
40	Dark matter halos with cores from hierarchical structure formation. Physical Review D, 2007, 75, .	4.7	58
41	MeV dark matter and small scale structure. Physical Review D, 2007, 76, .	4.7	55
42	Dark energy and dark matter haloes. Monthly Notices of the Royal Astronomical Society, 0, 357, 387-400.	4.4	51
43	Indirect dark matter detection limits from the ultrafaint Milky Way satellite Segue 1. Physical Review D, 2010, 82, .	4.7	51
44	Dark matter in dwarf spheroidal galaxies and indirect detection: a review. Reports on Progress in Physics, 2018, 81, 056901.	20.1	48
45	The TOP-IMPLART project. European Physical Journal Plus, 2011, 126, 1.	2.6	46
46	Searching for Beyond the Standard Model Physics with COHERENT Energy and Timing Data. Physical Review Letters, 2019, 123, 061801.	7.8	46
47	Dark Matter Signals from Timing Spectra at Neutrino Experiments. Physical Review Letters, 2020, 124, 121802.	7.8	46
48	Resolving Cosmic Gamma Ray Anomalies with Dark Matter Decaying Now. Physical Review Letters, 2007, 99, 191301.	7.8	45
49	Sensitivity to<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>Z</mml:mi></mml:math>-prime and nonstandard neutrino interactions from ultralow threshold neutrino-nucleus coherent scattering. Physical Review D, 2016, 93, .	4.7	45
50	Non-standard interactions of solar neutrinos in dark matter experiments. Physics Letters, Section B: Nuclear, Elementary Particle and High-Energy Physics, 2017, 773, 242-246.	4.1	44
51	Chemical Abundance Analysis of Tucana III, the Second r-process Enhanced Ultra-faint Dwarf Galaxy*. Astrophysical Journal, 2019, 882, 177.	4.5	42
52	Scaling relations for dark matter annihilation and decay profiles in dwarf spheroidal galaxies. Monthly Notices of the Royal Astronomical Society, 2019, 482, 3480-3496.	4.4	42
53	THE COSMIC ABUNDANCE OF CLASSICAL MILKY WAY SATELLITES. Astrophysical Journal, 2012, 749, 75.	4.5	41
54	Sommerfeld-enhanced <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>J</mml:mi></mml:math> -factors for dwarf spheroidal galaxies. Physical Review D, 2017, 95, .	4.7	38

#	Article	IF	Citations
55	Wimp searches with gamma rays in the Fermi era: Challenges, methods and results. Journal of Experimental and Theoretical Physics, 2015, 121, 1104-1135.	0.9	37
56	Sensitivity to oscillation with a sterile fourth generation neutrino from ultralow threshold neutrino-nucleus coherent scattering. Physical Review D, 2016, 94, .	4.7	37
57	Space Motions of the Dwarf Spheroidal Galaxies Draco and Sculptor Based on HST Proper Motions with a â^¼10 yr Time Baseline. Astrophysical Journal, 2017, 849, 93.	4.5	37
58	Effective field theory treatment of the neutrino background in direct dark matter detection experiments. Physical Review D, 2016, 93, .	4.7	36
59	Dynamical Models for the Sculptor Dwarf Spheroidal in a Î›CDM Universe. Astrophysical Journal, 2017, 838, 123.	4.5	36
60	Probing light mediators at ultralow threshold energies with coherent elastic neutrino-nucleus scattering. Physical Review D, 2017, 96, .	4.7	36
61	Accelerator and reactor complementarity in coherent neutrino-nucleus scattering. Physical Review D, 2018, 97, .	4.7	35
62	Testing the Dark Matter interpretation of the DAMA/LIBRA result with Super-Kamiokande. Journal of Cosmology and Astroparticle Physics, 2009, 2009, 032-032.	5.4	33
63	Chemical Abundance Analysis of Three Î±-poor, Metal-poor Stars in the Ultrafaint Dwarf Galaxy Horologium I*. Astrophysical Journal, 2018, 852, 99.	4.5	33
64	Coherent elastic neutrino-nucleus scattering in multi-ton scale dark matter experiments: classification of vector and scalar interactions new physics signals. Journal of High Energy Physics, 2019, 2019, 1.	4.7	33
65	The velocity anisotropy of the Milky Way satellite system. Monthly Notices of the Royal Astronomical Society, 2019, 486, 2679-2694.	4.4	32
66	Robust velocity dispersion and binary population modelling of the ultrafaint dwarf galaxy Reticulum II. Monthly Notices of the Royal Astronomical Society, 2019, 487, 2961-2968.	4.4	28
67	Effective <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>J</mml:mi></mml:math> -factor of the Galactic Center for velocity-dependent dark matter annihilation. Physical Review D, 2018, 98, .	4.7	27
68	The Morphology and Structure of Stellar Populations in the Fornax Dwarf Spheroidal Galaxy from Dark Energy Survey Data. Astrophysical Journal, 2019, 881, 118.	4.5	27
69	The Milky Wayâ€™s stellar streams and globular clusters do not align in a Vast Polar Structure. Monthly Notices of the Royal Astronomical Society, 2020, 494, 983-1001.	4.4	27
70	Leptoquark implication from the CMS and IceCube experiments. Physical Review D, 2015, 91, .	4.7	26
71	A global analysis strategy to resolve neutrino NSI degeneracies with scattering and oscillation data. Journal of High Energy Physics, 2020, 2020, 1.	4.7	26
72	Constraining dark matter in galactic substructure. Physical Review D, 2010, 82, .	4.7	25

#	Article	IF	Citations
73	Neutrino Physics with Dark Matter Detectors. Annual Review of Nuclear and Particle Science, 2019, 69, 137-161.	10.2	24
74	Dark matter, light mediators, and the neutrino floor. Physical Review D, 2017, 95, .	4.7	21
75	Dynamical Constraints on the Dark Matter Distribution of the Sculptor Dwarf Spheroidal from Stellar Proper Motions. Astrophysical Journal, 2018, 860, 56.	4.5	21
76	Detecting CNO solar neutrinos in next-generation xenon dark matter experiments. Physical Review D, 2019, 99, .	4.7	20
77	Proper Motion of Milky Way Dwarf Spheroidals from Line-of-Sight Velocities. Astrophysical Journal, 2008, 682, L93-L96.	4.5	18
78	Dwarf spheroidal J-factors without priors: A likelihood-based analysis for indirect dark matter searches. Monthly Notices of the Royal Astronomical Society, 2017, 466, 669-676.	4.4	18
79	Effective <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>J</mml:mi></mml:math> -factors for MilkyÂWay dwarf spheroidal galaxies with velocity-dependent annihilation. Physical Review D, 2020, 102, .	4.7	18
80	New constraints on isospin-violating dark matter. Physical Review D, 2012, 85, .	4.7	17
81	Confronting Galactic center and dwarf spheroidal gamma-ray observations with cascade annihilation models. Physical Review D, 2015, 92, .	4.7	16
82	Identification of RR Lyrae Stars in Multiband, Sparsely Sampled Data from the Dark Energy Survey Using Template Fitting and Random Forest Classification. Astronomical Journal, 2019, 158, 16.	4.7	16
83	A Chemo-dynamical Link between the GjÃ¶ll Stream and NGC 3201. Astrophysical Journal, 2020, 901, 23.	4.5	16
84	Searching for dark matter signals in timing spectra at neutrino experiments. Journal of High Energy Physics, 2022, 2022, 1.	4.7	16
85	The Local Group Mass in the Light of Gaia. Astrophysical Journal Letters, 2022, 928, L5.	8.3	16
86	Milky Way Satellite Census. IV. Constraints on Decaying Dark Matter from Observations of Milky Way Satellite Galaxies. Astrophysical Journal, 2022, 932, 128.	4.5	16
87	Neutrino scattering and B anomalies from hidden sector portals. Journal of High Energy Physics, 2019, 2019, 1.	4.7	15
88	Angular distribution of gamma-ray emission from velocity-dependent dark matter annihilation in subhalos. Physical Review D, 2019, 100, .	4.7	15
89	Dark matter from late invisible decays to and of gravitinos. Physical Review D, 2015, 91, .	4.7	14
90	A Deeper Look at DES Dwarf Galaxy Candidates: Grus i and Indus ii. Astrophysical Journal, 2021, 916, 81.	4.5	14

#	Article	IF	Citations
91	Coherent elastic neutrino-nucleus scattering with directional detectors. Physical Review D, 2020, 102, .	4.7	13
92	Tidal features of classical Milky Way satellites in a Î› cold dark matter universe. Monthly Notices of the Royal Astronomical Society, 2017, 468, 4887-4901.	4.4	12
93	Velocity-dependent J-factors for annihilation radiation from cosmological simulations. Journal of Cosmology and Astroparticle Physics, 2021, 2021, 070.	5.4	12
94	Three-dimensional structure of the Sagittarius dwarf spheroidal core from RR Lyrae. Monthly Notices of the Royal Astronomical Society, 2020, 495, 4124-4134.	4.4	11
95	Dark and luminous mass components of Omega Centauri from stellar kinematics. Monthly Notices of the Royal Astronomical Society, 2022, 511, 4251-4264.	4.4	11
96	Atmospheric neutrinos in next-generation xenon and argon dark matter experiments. Physical Review D, 2021, 104, .	4.7	10
97	Stellar proper motions in the outskirts of classical dwarf spheroidal galaxies withGaiaEDR3. Monthly Notices of the Royal Astronomical Society, 2022, 512, 5601-5619.	4.4	10
98	Local Group timing argument and virial theorem mass estimators from cosmological simulations. Monthly Notices of the Royal Astronomical Society, 2022, 511, 6193-6204.	4.4	9
99	Dwarf spheroidal J-factor likelihoods for generalized NFW profiles. Monthly Notices of the Royal Astronomical Society, 2019, 488, 2616-2628.	4.4	8
100	Coherent elastic neutrino-nucleus scattering with the Î½BDXâ^'DRIFT directional detector at next generation neutrino facilities. Physical Review D, 2021, 104, .	4.7	8
101	Possible Detection of Gamma-Rays from Epsilon Eridani. Astrophysical Journal, 2019, 878, 8.	4.5	5
102	Time variation of the atmospheric neutrino flux at dark matter detectors. Physical Review D, 2022, 105, .	4.7	4
103	Indirect detection of the partial <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>p</mml:mi></mml:math> wave via the <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mi>s</mml:mi></mml:math> wave in the annihilation cross section of dark matter. Physical Review D, 2019, 99, .	4.7	2
104	Astrophysical interplay in dark matter searches. , 2013, , .		1
105	Milky Way Satellites: Galaxies with a Dark Side. Nuclear Physics, Section B, Proceedings Supplements, 2009, 194, 166-170.	0.4	0
106	Testing the Accuracy of the Tangent Point Method for Determining the Milky Wayâ€™s Inner Rotation Curve. Research Notes of the AAS, 2020, 4, 165.	0.7	0