

Xiaolong Zhu

List of Publications by Citations

Source: <https://exaly.com/author-pdf/4455406/xiaolong-zhu-publications-by-citations.pdf>

Version: 2024-04-28

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

109
papers

543
citations

14
h-index

18
g-index

119
ext. papers

745
ext. citations

2
avg, IF

2.94
L-index

#	Paper	IF	Citations
109	Electron emission from single-electron capture with simultaneous single-ionization reactions in 30-keV/u He ²⁺ -on-argon collisions. <i>Physical Review A</i> , 2011 , 83,	2.6	44
108	Observation of interatomic Coulombic decay and electron-transfer-mediated decay in high-energy electron-impact ionization of Ar ₂ . <i>Physical Review A</i> , 2013 , 88,	2.6	26
107	HIAF: New opportunities for atomic physics with highly charged heavy ions. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2017 , 408, 169-173	1.2	24
106	Influence of Ambient Gas on Laser-Induced Breakdown Spectroscopy of Uranium Metal. <i>Plasma Science and Technology</i> , 2015 , 17, 971-974	1.5	22
105	Radiative-electron-capture-to-continuum cusp in U ⁸⁸⁺⁺ N ₂ collisions and the high-energy endpoint of electron-nucleus bremsstrahlung. <i>Physical Review A</i> , 2014 , 90,	2.6	21
104	A progress report of 320 kV multi-discipline research platform for highly charged ions. <i>Journal of Physics: Conference Series</i> , 2009 , 163, 012104	0.3	21
103	Investigation of ion-atom collision dynamics through imaging techniques 2008 , 51, 755-764		20
102	Damaging Intermolecular Energy and Proton Transfer Processes in Alpha-Particle-Irradiated Hydrogen-Bonded Systems. <i>Angewandte Chemie - International Edition</i> , 2018 , 57, 17023-17027	16.4	18
101	Electron-capture-to-continuum cusp in U ⁸⁸⁺⁺ N ₂ collisions. <i>Physical Review A</i> , 2015 , 91,	2.6	16
100	Electron-loss-to-continuum cusp in U ⁸⁸⁺⁺ N ₂ collisions. <i>Physical Review A</i> , 2014 , 90,	2.6	16
99	YAP:Ce and CsI(Tl) detectors for dielectronic recombination experiment at the CSRm. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2013 , 317, 731-733	1.2	15
98	Observation of two sequential pathways of (CO ₂) ₃ ⁺ dissociation by heavy-ion impact. <i>Physical Review A</i> , 2016 , 94,	2.6	15
97	Dielectronic and Trielectronic Recombination Rate Coefficients of Be-like Ar 14+. <i>Astrophysical Journal, Supplement Series</i> , 2018 , 235, 2	8	14
96	Dissociation of [HCCH] to H and C: a benchmark reaction involving H migration, H-H combination, and C-H bond cleavage. <i>Physical Chemistry Chemical Physics</i> , 2018 , 20, 27725-27729	3.6	14
95	Dynamics of C ₂ H ₂ ³⁺ -H ⁺⁺ -C ₂ ⁺ investigated by 50-keV/u Ne ⁸⁺ impact. <i>Physical Review A</i> , 2018 , 97,	2.6	13
94	Study of dielectronic recombination at the CSRm using lithium-like Ar ¹⁵⁺ ions. <i>Physica Scripta</i> , 2015 , T166, 014023	2.6	12
93	State-selective electron capture in 30- and 100-keV He ⁺⁺ -He collisions. <i>Physical Review A</i> , 2017 , 95,	2.6	11

92	Measurements of bremsstrahlung spectra of Lanzhou ECR Ion Source No. 3 (LECR3). <i>Review of Scientific Instruments</i> , 2006 , 77, 03A312	1.7	11
91	Interatomic relaxation processes induced in neon dimers by electron-impact ionization. <i>Physical Review A</i> , 2018 , 97,	2.6	10
90	Longitudinal dynamics of RF-bunched and electron-cooled ion beam at the CSRe. <i>Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment</i> , 2014 , 736, 75-80	1.2	10
89	Determining excitation temperature of fragmented C60 via momentum distributions of fragments. <i>Physical Chemistry Chemical Physics</i> , 2011 , 13, 3328-33	3.6	9
88	Kinetic energies of . <i>Chemical Physics Letters</i> , 2009 , 470, 215-218	2.5	9
87	Dissociation mechanisms of the Ar trimer induced by a third atom in high-energy electron-impact ionization. <i>Physical Review A</i> , 2014 , 89,	2.6	8
86	Angular- and state-selective differential cross sections for single-electron capture in p-He collisions at intermediate energies. <i>Physical Review A</i> , 2012 , 86,	2.6	8
85	Evidence of strong projectile-target-core interaction in single ionization of neon by electron impact. <i>Physical Review A</i> , 2010 , 82,	2.6	8
84	Electron Ion Recombination Rate Coefficients of Be-like 40Ca16+. <i>Astrophysical Journal</i> , 2018 , 862, 134	4.7	7
83	Signatures of the projectile electron-target core elastic scattering in Ar (e, 2e) reactions at low and intermediate impact energies. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2011 , 44, 055202	1.3	7
82	Dielectronic recombination experiments at the storage rings: From the present CSR to the future HIAF. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2017 , 408, 135-139	1.2	6
81	Breakdown of the Coulomb-explosion imaging technique induced by the ultrafast rotation of fragments. <i>Physical Review A</i> , 2020 , 101,	2.6	6
80	Observation of atomic-size Fraunhofer-type diffraction for single electron capture in He2++ He collision. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2012 , 45, 025202	1.3	6
79	Regime change and transitional regime behavior of C60 molecular beams. <i>Chemical Physics Letters</i> , 2018 , 691, 110-113	2.5	6
78	Probing scattering phases via two-center interferences in collisions of He2+ on CO. <i>Physical Review A</i> , 2018 , 97,	2.6	5
77	Measurement of the lifetime and the proportion of 12C3+ ions in stored relativistic ion beams as a preparation for laser cooling experiments at the CSRe. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2017 , 408, 280-284	1.2	5
76	(e,2e) processes on atomic targets (Ne, Ar) and molecular targets (CH4, N2, CO2): Role of electron-nucleus scattering. <i>Physical Review A</i> , 2012 , 86,	2.6	5
75	Multistage transformation and charge effect during the fragmentation phase transition in atomic clusters. <i>Physical Review A</i> , 2013 , 87,	2.6	5

74	High negative ion production yield in 30 keV F ²⁺ adenine (C ₅ H ₅ N ₅) collisions. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2009 , 42, 075204	1.3	5
73	ATOMIC PHYSICS RESEARCHES AT COOLER STORAGE RING IN LANZHOU. <i>International Journal of Modern Physics E</i> , 2009 , 18, 373-380	0.7	5
72	The many-particle scattering system He ⁺⁺ on He: Experiment and a complete unified description. <i>Physics Letters, Section A: General, Atomic and Solid State Physics</i> , 2007 , 369, 85-89	2.3	5
71	Single-electron capture in 3-keV/u Ar ⁸⁺ -He collisions. <i>Physical Review A</i> , 2017 , 95,	2.6	4
70	Two-body fragmentation dynamics of N ₂ O ^{q+} (q=2,3) induced by electron-capture collisions with 5.7keV/uXe ¹⁵⁺ . <i>Physical Review A</i> , 2019 , 99,	2.6	4
69	Two-body dissociation of CH isomers investigated by 50 keV/u Ne impact. <i>Journal of Chemical Physics</i> , 2019 , 150, 144311	3.9	4
68	Time-resolved photoion imaging spectroscopy: Determining energy distribution in multiphoton absorption experiments. <i>Journal of Chemical Physics</i> , 2018 , 148, 134303	3.9	4
67	Probing the geometry of Ar ₂ N ₂ cluster by 1 MeV Ne ⁸⁺ ions. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2017 , 408, 42-45	1.2	3
66	Laser cooling and precision laser spectroscopy of highly charged ions at the storage ring CSRe and the future HIAF. <i>Hyperfine Interactions</i> , 2019 , 240, 1	0.8	3
65	Four-body Coulomb explosion of acetylene in collision with highly charged ions. <i>Physical Review A</i> , 2020 , 101,	2.6	3
64	Two-electron transfer and ionization mechanism in 80-keV/u Ne ⁸⁺ on He collisions. <i>Physical Review A</i> , 2016 , 93,	2.6	3
63	Picturing electron capture to the continuum in the transfer ionization of intermediate-energy He ²⁺ collisions with argon. <i>Physical Review A</i> , 2013 , 87,	2.6	3
62	Properties and applications of cold supersonic gas jet 2006 , 49, 709-715		3
61	A compact, flexible low energy experimental platform of highly charged ions for atomic physics experiments. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2019 , 460, 224-229	1.2	3
60	Delayed fragmentation of propyne and allene in collisions with highly charged ions. <i>Physical Review A</i> , 2020 , 102,	2.6	2
59	Three-body fragmentation dynamics of CH ₂ CCH ₂ ³⁺ investigated by 50-keV/u Ne ⁸⁺ impact. <i>Physical Review A</i> , 2020 , 101,	2.6	2
58	Heavy N ion transfer in doubly charged NAr van der Waals cluster. <i>Nature Communications</i> , 2020 , 11, 2987	17.4	2
57	Measurement of the ratio of C ³⁺ and O ⁴⁺ ions produced by ECRIS to prepare a laser cooling experiment at storage rings. <i>Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment</i> , 2014 , 764, 232-235	1.2	2

56	New insight into power-law behavior of fragment size distributions in the C _n multifragmentation regime. <i>Journal of Chemical Physics</i> , 2014 , 141, 054307	3.9	2
55	Preparations for laser cooling of relativistic heavy-ion beams at the CSRe. <i>Physica Scripta</i> , 2013 , T156, 014090	2.6	2
54	Differential investigations of charge transfer processes in low energy ion-atom/molecule collisions. <i>Journal of Physics: Conference Series</i> , 2007 , 88, 012019	0.3	2
53	Dielectronic recombination at low energy range with Boron-like Ar ¹³⁺ at the CSRm. <i>X-Ray Spectrometry</i> , 2020 , 49, 155-159	0.9	2
52	Measurement of n-resolved State-selective Charge Exchange in Ne(8,9) ⁺ Collision with He and H ₂ . <i>Astrophysical Journal, Supplement Series</i> , 2021 , 253, 13	8	2
51	Longitudinal modulation of electron-cooled 12C ⁶⁺ and 16O ⁸⁺ ion beams at heavy ion storage ring CSRe. <i>Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment</i> , 2018 , 908, 244-249	1.2	2
50	Fully differential study of few-body dynamics in multi-electron atomic fragmentation processes. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2017 , 50, 10LT01	1.3	1
49	Electron-ion recombination rate coefficients of carbon-like Ar ¹²⁺ . <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2020 , 53, 085004	1.3	1
48	Dielectronic recombination of Be-like argon at the CSRm. <i>Journal of Physics: Conference Series</i> , 2017 , 875, 012020	0.3	1
47	Development of a single-particle detector for the dielectronic recombination experiment on HIRFL-CSRm. <i>Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment</i> , 2014 , 735, 552-556	1.2	1
46	Dielectronic recombination experiment of P-like Tin on HIRFL-CSRm at Lanzhou. <i>Journal of Physics: Conference Series</i> , 2014 , 488, 012055	0.3	1
45	RF-bunching of relativistic 12C ³⁺ ion beam for laser cooling experiment at the CSRe. <i>Journal of Physics: Conference Series</i> , 2015 , 583, 012045	0.3	1
44	Projectile charge state effects on electron emission in transfer ionization processes. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2015 , 48, 144021	1.3	1
43	Experimental evidence of the target excitation in transfer ionization of He ²⁺ on argon collisions. <i>Physica Scripta</i> , 2013 , T156, 014030	2.6	1
42	Differential experimental investigation of electron capture for He ²⁺ on Helium at low energy. <i>Journal of Physics: Conference Series</i> , 2009 , 163, 012064	0.3	1
41	Dissociation and fragmentation of N ₂ molecules by slow highly charged ions. <i>Nuclear Instruments & Methods in Physics Research B</i> , 2005 , 235, 387-391	1.2	1
40	Absolute rate coefficients for dielectronic recombination of Na-like Kr ²⁵⁺ . <i>Physical Review A</i> , 2020 , 102,	2.6	1
39	Prompt and delayed dissociation of N ₂ O ²⁺ induced by highly-charged-ion collisions. <i>Physical Review A</i> , 2021 , 103,	2.6	1

38	Damaging Intermolecular Energy and Proton Transfer Processes in Alpha-Particle-Irradiated Hydrogen-Bonded Systems. <i>Angewandte Chemie</i> , 2018 , 130, 17269-17273	3.6	1
37	Orientation effect in Ar dimer fragmentation by highly charged ion impact. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2018 , 51, 155204	1.3	1
36	State-selective electron capture in He ⁺ + He collisions at intermediate energies. <i>Journal of Physics: Conference Series</i> , 2017 , 875, 092019	0.3	0
35	A beam profile monitor for picoampere low-energy ion beams. <i>Review of Scientific Instruments</i> , 2019 , 90, 076107	1.7	0
34	Optical detection system for laser cooling and precision laser spectroscopy of relativistic highly charged ions at the CSRe. <i>X-Ray Spectrometry</i> , 2020 , 49, 138-142	0.9	0
33	Frontiers of atomic physics with highly charged heavy ions at HIAF. <i>Journal of Physics: Conference Series</i> , 2017 , 875, 092021	0.3	
32	Direct evidence of Interatomic Coulombic Decay in electron impact ionization of Ne dimer. <i>Journal of Physics: Conference Series</i> , 2017 , 875, 062033	0.3	
31	Investigation of fragmentation dynamics of nitrogen dimers by collisions with highly charged ions. <i>Journal of Physics: Conference Series</i> , 2017 , 875, 102037	0.3	
30	Observation of the indirect (e, 3e) process of CO. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2018 , 51, 185203	1.3	
29	The target effect in transfer ionization in proton-helium and neon collisions at intermediate energies. <i>Journal of Physics: Conference Series</i> , 2014 , 488, 082017	0.3	
28	Analysis of ionic fragment size distribution in collision of nanosecond laser with the C60 molecule. <i>Journal of Physics: Conference Series</i> , 2014 , 488, 022043	0.3	
27	Dynamics of transfer ionization process in p-He collisions at intermediate energies. <i>Journal of Physics: Conference Series</i> , 2014 , 488, 082018	0.3	
26	Forward-angle electron spectroscopy in heavy-ion atom collisions studied at the ESR. <i>Journal of Physics: Conference Series</i> , 2015 , 635, 022005	0.3	
25	Kinematically complete experiment for ionization-excitation of helium. <i>Journal of Physics: Conference Series</i> , 2015 , 635, 052079	0.3	
24	Possible evidence for a liquid-gas phase transition in C60 systems. <i>Journal of Physics: Conference Series</i> , 2015 , 635, 102013	0.3	
23	Origin of the sequential dissociation of (CO ₂) ₃ ⁺ by heavy ion impact. <i>Journal of Physics: Conference Series</i> , 2015 , 635, 032100	0.3	
22	The nucleus-nucleus scattering in transfer ionization of helium by He ₂ ⁺ impact. <i>Journal of Physics: Conference Series</i> , 2015 , 635, 022077	0.3	
21	Experimental investigation of state selective single-electron capture in 120 keV Ar ₈ ⁺ - He collisions. <i>Journal of Physics: Conference Series</i> , 2015 , 635, 022079	0.3	

- 20 The fragmentation of neon dimer induced by low energy O₆₊ ions. *Journal of Physics: Conference Series*, **2015**, 635, 032102 0.3
- 19 Progress of laser cooling of ¹²C³⁺ ions at the CSRe. *Journal of Physics: Conference Series*, **2015**, 635, 022080
- 18 Mutual ionization in atomic collisions near the electronic threshold. *Journal of Physics B: Atomic, Molecular and Optical Physics*, **2014**, 47, 105202 1.3
- 17 News from the CSR storage ring. *Journal of Physics: Conference Series*, **2009**, 194, 152004 0.3
- 16 Progress of dielectronic recombination experiment at CSRm. *Journal of Physics: Conference Series*, **2012**, 388, 062032 0.3
- 15 General overview of the strong projectile-target-core interaction in Ne (e, 2e) reaction. *Journal of Physics: Conference Series*, **2012**, 388, 042045 0.3
- 14 Observation of atomic-size Fraunhofer-type diffraction for single electron capture in He²⁺⁺He collision. *Journal of Physics: Conference Series*, **2012**, 388, 082053 0.3
- 13 Analysis of momentum and energy resolutions of the reaction microscopes. *Journal of Physics: Conference Series*, **2012**, 388, 142008 0.3
- 12 Image of electron emission in He²⁺-He collisions at intermediate energies. *Journal of Physics: Conference Series*, **2012**, 388, 082022 0.3
- 11 State-selective electron capture by O³⁺ ions on He and H₂. *Journal of Physics: Conference Series*, **2012**, 388, 102014 0.3
- 10 Measuring phase transition temperature of fragmented C₆₀. *Journal of Physics: Conference Series*, **2012**, 388, 022110 0.3
- 9 Experimental investigation of single capture with single ionization in 30keV/u He²⁺ on argon collisions. *Journal of Physics: Conference Series*, **2012**, 388, 082006 0.3
- 8 Electron emitted in transfer ionization in He²⁺ on helium collisions. *Journal of Physics: Conference Series*, **2009**, 185, 012007 0.3
- 7 Imaging the electrons from transfer ionization collisions. *Journal of Physics: Conference Series*, **2009**, 194, 082034 0.3
- 6 Recent progresses on atomic physics with highly charged ions in Lanzhou. *Journal of Physics: Conference Series*, **2009**, 185, 012024 0.3
- 5 State-selective single electron capture studied for C⁴⁺ ions on H₂ at 40 keV. *Journal of Physics: Conference Series*, **2009**, 194, 102020 0.3
- 4 Two-center structure effects in collision between H₂⁺ and He. *Journal of Physics: Conference Series*, **2009**, 194, 102029 0.3
- 3 Electron transfer and multi-ionization in slow collisions of C₆₀ with highly charged ions. *Nuclear Instruments & Methods in Physics Research B*, **2005**, 235, 378-381 1.2

- 2 Charge-exchange X-Ray Signature in Laboratory Outflow Interaction with Neutrals. *Astrophysical Journal*, **2022**, 925, 150 4-7
- 1 State-selective single-electron capture in 30-keV N³⁺H_e collisions. *X-Ray Spectrometry*, **2020**, 49, 85-89 0-9