

Tomas Brage

List of Publications by Year in descending order

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131
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172457

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133
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133
docs citations

133
times ranked

1020
citing authors

#	ARTICLE	IF	CITATIONS
1	[Kr] d_{10} the final Lyzer quenched configuration for highly charged ions.. Journal of Quantitative Spectroscopy and Radiative Transfer, 2022, , 108215.	2.3	0
2	Magnetically induced transition in the spectrum of Sr iv. Physical Review A, 2021, 103, .	2.5	0
3	Observation of electric-dipole transitions in the laser-cooling candidate Th^{110+} and its application for cooling antiprotons. Physical Review A, 2021, 103, .	2.5	0
4	Hinode/EIS Coronal Magnetic Field Measurements at the Onset of a C2 Flare. Astrophysical Journal, 2021, 913, 1.	4.5	20
5	A Theoretical Investigation of the Magnetic-field-induced Transition in Fe X, of Importance for Measuring Magnetic Field Strengths in the Solar Corona. Astrophysical Journal, 2021, 913, 135.	4.5	14
6	Experimental and theoretical studies of excited states in Ir^{25+} Physical Review A, 2021, 103, .	4.5	6
7	Atomic Structure Calculations of Landé g Factors of Astrophysical Interest with Direct Applications for Solar Coronal Magnetometry. Astrophysical Journal, 2021, 923, 186.	4.5	6
8	The 13th International Colloquium on Atomic Spectra and Oscillator Strengths for Astrophysical and Laboratory Plasmas. Atoms, 2020, 8, 43.	1.6	0
9	Proposal for observation of transitions induced by external magnetic fields mixing in the lower states: with an example from Fe X. Journal of Physics B: Atomic, Molecular and Optical Physics, 2020, 53, 095002.	1.5	8
10	Hfszeeman95 A program for computing weak and intermediate magnetic-field- and hyperfine-induced transition rates. Computer Physics Communications, 2020, 253, 107211.	7.5	18
11	SUMER Measurement of the $Fe\ x\ 3p\ ^4\ ^3d^4\ ^5/2,7/2$ Energy Difference. Astrophysical Journal, 2020, 902, 21.	4.5	11
12	Hinode/EIS Measurements of Active-region Magnetic Fields. Astrophysical Journal, 2020, 904, 87.	4.5	32
13	A First Spectroscopic Measurement of the Magnetic-field Strength for an Active Region of the Solar Corona. Astrophysical Journal Letters, 2020, 898, L34.	8.3	26
14	Multiconfiguration Dirac-Hartree-Fock calculations of Landé g-factors for ions of astrophysical interest: B II, C IV , Al II , Si IV , P II, S II, Cl III, Ar IV, Ca I, Ti II, Zr III, and Sn II. Astronomy and Astrophysics, 2020, 639, A25.	5.1	6
15	Candidate for Laser Cooling of a Negative Ion: High-Resolution Photoelectron Imaging of Th^{110+} . Physical Review Letters, 2019, 123, 203002.	7.8	43
16	The structure and radiative lifetimes of negative ions homologous to N^{10-} . Journal of Physics B: Atomic, Molecular and Optical Physics, 2019, 52, 125002.	1.5	8
17	MCDHF and RCI calculations of energy levels, lifetimes, and transition rates in Si^{III} and Si^{IV} . Astronomy and Astrophysics, 2019, 631, A29.	5.1	3
18	Time-Stretched Spectroscopy by the Quantum Zeno Effect: The Case of Auger Decay. Physical Review Letters, 2018, 121, 233201.	7.8	1

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19	<p>Breit and QED effects on the $3d^3$ ground state of Fe-like ions. Physical Review A, 2017, 95, 053405.</p> <p>Proposed highly accurate tests of Breit and QED effects in the ground state of the F-like isoelectronic sequence. Physical Review A, 2018, 98, 053405.</p>	2.5	25
20	<p>Proposal of highly accurate tests of Breit and QED effects in the ground state of the F-like isoelectronic sequence. Physical Review A, 2018, 98, 053405.</p>	2.5	25
21	Resolving a discrepancy between experimental and theoretical lifetimes in atomic negative ions. Journal of Physics B: Atomic, Molecular and Optical Physics, 2017, 50, 025001.	1.5	10
22	Persistent discrepancy between experimental and theoretical lifetimes for $3d^3$ ground state of Fe-like ions. Physical Review A, 2017, 95, 053405.	2.5	25
23	Comment on "Theoretical Confirmation of the Low Experimental Value Ratio in Fe xviii". Physical Review Letters, 2017, 119, 189301.	2.5	3
24	Comment on "Theoretical Confirmation of the Low Experimental Value Ratio in Fe xviii". Physical Review Letters, 2017, 119, 189301.	2.5	3
25	Multiconfiguration Dirac-Hartree-Fock Calculations with Spectroscopic Accuracy: Applications to Astrophysics. Atoms, 2017, 5, 16.	1.6	40
26	Investigation of M1 transitions of the ground-state configuration of In-like tungsten. Journal of Physics B: Atomic, Molecular and Optical Physics, 2016, 49, 105002.	1.5	6
27	Energy levels and transition rates for helium-like ions with $Z \leq 10$. Astronomy and Astrophysics, 2016, 592, A141.	5.1	30
28	Accurate multiconfiguration calculations of energy levels, lifetimes, and transition rates for the silicon isoelectronic sequence. Astronomy and Astrophysics, 2016, 585, A26.	5.1	18
29	ON THE FINE STRUCTURE SPLITTING OF THE $3p^4 3d^4 D_{5/2}$ AND $3p^4 3d^4 D_{7/2}$ LEVELS OF Fe x. Astrophysical Journal, 2016, 833, 185.	4.5	11
30	ATOMIC-LEVEL PSEUDO-DEGENERACY OF ATOMIC LEVELS GIVING TRANSITIONS INDUCED BY MAGNETIC FIELDS, OF IMPORTANCE FOR DETERMINING THE FIELD STRENGTHS IN THE SOLAR CORONA. Astrophysical Journal, 2016, 826, 219.	4.5	35
31	Advanced multiconfiguration methods for complex atoms: I. Energies and wave functions. Journal of Physics B: Atomic, Molecular and Optical Physics, 2016, 49, 182004.	1.5	197
32	Calculations with spectroscopic accuracy for the ground configuration ($3d^3$) forbidden transition in Co-like ions. Physical Review A, 2016, 93, 053405.	2.5	29
33	Analysis of the competition between forbidden and hyperfine-induced transitions in Ne-like ions. Physical Review A, 2016, 93, 053405.	2.5	7
34	A strong visible line in the spectrum of W^{11+} . Physica Scripta, 2016, 91, 105401.	2.5	9
35	Energy levels and radiative data for Kr-like W^{38+} from MCDHF and RMBPT calculations. Journal of Physics B: Atomic, Molecular and Optical Physics, 2016, 49, 135003.	1.5	13
36	Review of highly charged tungsten spectroscopy research using low energy EBITs at the Shanghai EBIT laboratory. Journal of Physics B: Atomic, Molecular and Optical Physics, 2015, 48, 144029.	1.5	22

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37	Tungsten spectroscopy in the EUV range observed at a high-temperature superconducting electron-beam ion trap. <i>Physical Review A</i> , 2015, 91, .	2.5	25
38	A NOVEL METHOD TO DETERMINE MAGNETIC FIELDS IN LOW-DENSITY PLASMA FACILITATED THROUGH ACCIDENTAL DEGENERACY OF QUANTUM STATES IN Fe ⁹⁺ . <i>Astrophysical Journal</i> , 2015, 807, 69.	4.5	37
39	HYPERFINE-DEPENDENT g_f -VALUES OF Mn I LINES IN THE 1.49-1.80 μm H BAND. <i>Astrophysical Journal</i> , Supplement Series, 2015, 216, 2.	7.7	6
40	Magnetic-field-dependent angular distributions and linear polarizations of emissions from the		
41	in Ne-like ions. <i>Physical Review A</i> , 2014, 90, .		
41	Coronal lines and the importance of deep-core valence correlation in Ag-like ions. <i>Physical Review A</i> , 2014, 89, .	2.5	20
42	Forbidden-line spectroscopy of the ground-state configuration of Cd-like W. <i>Physical Review A</i> , 2014, 90, .	2.5	32
43	Unexpected transitions induced by spin-dependent, hyperfine and external magnetic-field interactions. <i>Physica Scripta</i> , 2014, 89, 114002.	2.5	20
44	Atomic data and theoretical X-ray spectra of Ge-like through V-like W ions. <i>Atomic Data and Nuclear Data Tables</i> , 2014, 100, 577-649.	2.4	37
45	The M1 ground state fine structure transition in Ag-like Yb. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2014, 47, 185004.	1.5	5
46	Theoretical investigation of magnetic-field-induced		
47	Accurate transition probabilities from large-scale multiconfiguration calculations - A tribute to Charlotte Froese Fischer. , 2013, , .	2.5	16
48	Lifetimes of the hyperfine levels of 3d94s3D3 in high-ZNi-like ions. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2013, 46, 145001.	1.5	3
49	Effect of an external magnetic field on the determination of E1M1 two-photon decay rates in Be-like ions. <i>Physical Review A</i> , 2013, 88, .	2.5	18
50	Experimental and theoretical study of the ground-state $M1$ transition in Ag-like tungsten. <i>Physical Review A</i> , 2012, 86, .	2.5	34
51	Hyperfine induced intensity redistribution in In $\text{hbox}\{\text{sc II}\}$. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2010, 43, 074012.	1.5	5
52	Hyperfine dependent lifetimes in Mg-like ions. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2010, 43, 095001.	1.5	22
53	Some historic and current aspects of plasma diagnostics using atomic spectroscopy. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 2010, 43, 144026.	1.5	4
54	Hyperfine-dependent lifetimes in Be-like ions. <i>Physical Review A</i> , 2009, 79, .	2.5	32

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55	Forbidden and Unexpected atomic transitions. , 2009, , .		5
56	Hyperfine-interaction-dependent $\langle s \rangle$ lifetimes in Zn-like ions. Physical Review A, 2008, 78, .	2.5	18
57	Hyperfine-state-dependent lifetimes along the Ni-like isoelectronic sequence. Physical Review A, 2008, 77, .	2.5	19
58	Effects on intercombination transition rates and branching ratios of the UV0.01 (3s23p23P1,2 \rightarrow 3s3p35S2) multiplet in Si I-like ions revisited. Journal of Physics B: Atomic, Molecular and Optical Physics, 2007, 40, 709-726.	1.5	3
59	Yao et al. Reply. Physical Review Letters, 2007, 98, .	7.8	4
60	Lifetime calculations for the 5s5p23 metastable level of Sr88I. Physical Review A, 2007, 75, .	2.5	5
61	MCDF calculations for the lowest excited states in the Zn-like sequence. Journal of Physics B: Atomic, Molecular and Optical Physics, 2006, 39, 3147-3158.	1.5	43
62	Systematic studies of highly excited Rydberg states in ions with two valance electrons. Journal of Physics B: Atomic, Molecular and Optical Physics, 2006, 39, 2815-2826.	1.5	3
63	Oscillator strengths and hyperfine structures in Ga II from multiconfiguration Dirac-Hartree-Fock calculations. Journal of Physics B: Atomic, Molecular and Optical Physics, 2006, 39, 1813-1824.	1.5	9
64	MF-Dependent Lifetimes due to Hyperfine Induced Interference Effects. Physical Review Letters, 2006, 97, 183001.	7.8	34
65	Multiconfiguration Dirac-Hartree-Fock calculations for intercombination lines in silicon-like ions. Journal of Physics B: Atomic, Molecular and Optical Physics, 2005, 38, 503-508.	1.5	11
66	Direct observation of the initial-state distribution of the first electron transferred to slow highly charged ions interacting with a metal surface. Physical Review A, 2004, 70, .	2.5	31
67	Visible light spectroscopy of Ar 6+ ions in high Rydberg states produced with a microcapillary target. Nuclear Instruments & Methods in Physics Research B, 2003, 205, 758-761.	1.4	4
68	Determination of Hyperfine-Induced Transition Rates from Observations of a Planetary Nebula. Physical Review Letters, 2002, 89, 281101.	7.8	60
69	Experimental and theoretical studies of lifetimes and transition probabilities for AuII. Journal of Physics B: Atomic, Molecular and Optical Physics, 2002, 35, 483-490.	1.5	9
70	3s23p-3s3p2 transitions in FeIV. Monthly Notices of the Royal Astronomical Society, 2002, 333, 885-893.	4.4	22
71	The O IV and S IV intercombination lines in the ultraviolet spectra of astrophysical sources. Monthly Notices of the Royal Astronomical Society, 2002, 337, 901-909.	4.4	29
72	The Bismuth Abundance in the HgMn Stars ϵ Lupi and HR 7775 and Improved Atomic Data for Selected Transitions of Biⁱ, Biⁱⁱ, and Biⁱⁱⁱ. Astrophysical Journal, 2001, 551, 520-535.	4.5	28

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73	Spectral Lines for Polarization Measurements of the Coronal Magnetic Field. III. Atomic Data for Siix. <i>Astrophysical Journal</i> , 2000, 540, 1114-1118.	4.5	9
74	A review of intercombination lines in beryllium-like ions. <i>Molecular Physics</i> , 2000, 98, 1057-1065.	1.7	9
75	Theoretical Oscillator Strengths and Hyperfine Structure in Hgii. <i>Astrophysical Journal</i> , 1999, 513, 524-534.	4.5	27
76	Mercury in the HgMn Stars ĩŁ Lupi and HR 7775. <i>Astrophysical Journal</i> , 1999, 512, 942-960.	4.5	55
77	Relativistic ab initio calculations of oscillator strengths and hyperfine structure constants in Tl II. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1999, 32, 3183-3192.	1.5	6
78	Very High Resolution Ultraviolet Spectroscopy of a Chemically Peculiar Star: Results of the ĩŁ Lupi Pathfinder Project. <i>Astronomical Journal</i> , 1999, 117, 1454-1470.	4.7	72
79	Lifetimes of the 5d96p levels in Hg III. <i>Physical Review A</i> , 1999, 59, 4068-4070.	2.5	4
80	Lines of OIV and SIV in the Goddard High-Resolution Spectrograph spectrum of RR Tel: constraints on atomic data. <i>Monthly Notices of the Royal Astronomical Society</i> , 1999, 303, L41-L46.	4.4	19
81	A Goddard High Resolution Spectrograph Atlas of Echelle Observations of the [CLC]HgMn[/CLC] Star ĩŁ Lupi. <i>Astronomical Journal</i> , 1999, 117, 1505-1548.	4.7	41
82	A Theoretical and Experimental Study of the Quartet System of B I. <i>Advances in Quantum Chemistry</i> , 1998, 30, 301-310.	0.8	4
83	Hyperfine Induced Transitions as Diagnostics of Isotopic Composition and Densities of Low-€ Density Plasmas. <i>Astrophysical Journal</i> , 1998, 500, 507-521.	4.5	76
84	Atomic Data Requirements for the Analysis of Chemically Peculiar Spectra. <i>Highlights of Astronomy</i> , 1998, 11, 650-652.	0.0	12
85	Theoretical Oscillator Strengths for Srii and Yiii, with Application to Abundances in the HgMn-€ Type Star ĩŁ Lupi. <i>Astrophysical Journal</i> , 1998, 496, 1051-1057.	4.5	27
86	Atomic Data Requirements for the Analysis of Chemically Peculiar Spectra. , 1998, , 650-652.		0
87	Relativistic empirical specification of transition probabilities from measured lifetime and energy level data. <i>Physica Scripta</i> , 1997, 56, 240-244.	2.5	13
88	Systematic CIV3 and MCDF calculations for the UV0.01 multiplet in O III. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1997, 30, 1385-1400.	1.5	8
89	Transition Rates of the Intercombination UV0.01 Multiplet in Nii. <i>Astrophysical Journal</i> , 1997, 478, 423-429.	4.5	23
90	Stellar chemical abundances with the GHRS. <i>Physica Scripta</i> , 1996, T65, 110-114.	2.5	20

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91	Core-valence and core-core correlation effects on hyperfine-structure parameters and oscillator strengths in Tl ii and Tl iii. <i>Physical Review A</i> , 1996, 53, 192-200.	2.5	31
92	Abundance and Isotopic Anomalies of Thallium in the Atmosphere of the HgMn Star chi LUPi. <i>Astrophysical Journal</i> , 1996, 462, 937.	4.5	24
93	Hyperfine Structure and Isotope Shift in Tl II with Astrophysical Applications. <i>Astrophysical Journal</i> , 1996, 462, 943.	4.5	21
94	Intercombinations and Allowed Transitions in O IV. <i>Astrophysical Journal</i> , 1996, 464, 1030.	4.5	46
95	Auger decay of Na-like Si ³⁺ (2p ⁵ 3lnl ^{€™}) states formed in slow Si ⁵⁺ + [†] He and Ar ion-atom collisions. <i>Physical Review A</i> , 1995, 51, 4652-4661.	2.5	5
96	Oscillator strengths for transitions in As II. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1995, 28, 1201-1210.	1.5	7
97	J-dependent lifetimes of the 2s2p3p4De and 2s2p3d4Fo terms in the boron isoelectronic sequence. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1995, 28, 4233-4247.	1.5	3
98	The abundances of Pt, Au, and Hg in the chemically peculiar HgMn-type stars kappa CANCRI and chi LUPi. <i>Astrophysical Journal</i> , 1995, 444, 438.	4.5	47
99	Transition probabilities for the UV0.01 multiplet in N III. <i>Astrophysical Journal</i> , 1995, 445, 457.	4.5	21
100	Interpretation of Anomalous Ultraviolet Transitions of Fe II Observed in Laboratory Fourier Transform Spectra and Stellar HST and IUE Spectra. <i>Astrophysical Journal</i> , 1995, 446, 361.	4.5	19
101	Systematic Studies of N IV Transitions of Astrophysical Importance. <i>Astrophysical Journal</i> , 1995, 455, 758.	4.5	37
102	Spline-Galerkin methods for Rydberg series, including Breit-Pauli effects. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1994, 27, 5467-5484.	1.5	12
103	Spline-Galerkin calculations for Rydberg series of calcium. <i>Physica Scripta</i> , 1994, 49, 651-660.	2.5	20
104	Effects of core-valence and core-core correlation on the line strength of the resonance lines in Li i and Na i. <i>Physical Review A</i> , 1994, 49, 2181-2184.	2.5	37
105	Spline-Galerkin methods applied to Rydberg series between the 4s2S and 3d2D limits of calcium. <i>Physical Review A</i> , 1994, 50, 2937-2947.	2.5	14
106	The pursuit of heavy elements in the HgMn-type star Chi Lupi: Observations with the GHRS in the COSTAR ERA. <i>Astrophysical Journal</i> , 1994, 435, L67.	4.5	14
107	A program for computing autoionization properties. <i>Computer Physics Communications</i> , 1993, 74, 381-398.	7.5	5
108	Ab initio calculations for intercombination and resonance lines in P II. <i>Physics Letters, Section A: General, Atomic and Solid State Physics</i> , 1993, 174, 111-115.	2.1	20

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109	Systematic calculations of correlation in complex ions. <i>Physica Scripta</i> , 1993, T47, 18-28.	2.5	67
110	MCHF calculations of autoionization widths in two- and three-electron systems. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1993, 26, 621-640.	1.5	18
111	Core polarization in Ca I and Ca II. <i>Physica Scripta</i> , 1993, 48, 533-545.	2.5	40
112	Lifetimes of 5d96p and 5d86s6p levels in Hg III. <i>Physical Review A</i> , 1993, 47, 884-889.	2.5	14
113	Autoionization studies of the 1s2s2p4P5/2 levels in He ⁺ , Li I, and Be II. <i>Physical Review A</i> , 1993, 47, 3718-3723.	2.5	21
114	Core polarization effects on oscillator strengths in neutral zinc. <i>Physica Scripta</i> , 1992, 45, 43-48.	2.5	23
115	Transition energies and probabilities in high-spin states of the boron sequence and an electron affinity for negative beryllium. <i>Physica Scripta</i> , 1992, 45, 436-444.	2.5	12
116	Non-variational, spline-Galerkin calculations of resonance positions and widths, and photodetachment and photo-ionization cross sections for H and He. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1992, 25, 5289-5314.	1.5	50
117	Autodetachment of the nsnp24P1/2 states in negative ions. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1992, 25, 4217-4228.	1.5	13
118	Autodetachment of negative ions. <i>Physical Review A</i> , 1991, 44, 72-79.	2.5	44
119	Core-excited quintet states in Mg I. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1991, 24, 905-920.	1.5	10
120	Experimental and theoretical study of core-excited states of Mg II. <i>Physica Scripta</i> , 1991, 44, 336-342.	2.5	8
121	Experimental and theoretical study of core-excited states of Al III. <i>Physica Scripta</i> , 1990, 42, 543-550.	2.5	10
122	Optical transition in the negative magnesium ion. <i>Physical Review A</i> , 1990, 42, 2728-2733.	2.5	16
123	Plunging configurations and J-dependent lifetimes in Mg-like ions. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1989, 22, 713-726.	1.5	64
124	The 1s2s2p25P-1s2p35S transition in Be I-like ions. <i>Journal of Physics B: Atomic, Molecular and Optical Physics</i> , 1988, 21, 2563-2569.	1.5	23
125	Accidental degeneracy of doubly excited states in Fe II. <i>Journal of Physics B: Atomic and Molecular Physics</i> , 1987, 20, 1153-1160.	1.6	2
126	1s2s2p2p35S5 transition in B II. <i>Physical Review A</i> , 1987, 35, 3136-3138.	2.5	18

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127	Lifetimes and oscillator strength trends for the 4s2ndD2series of Ga i. Physical Review A, 1987, 35, 1113-1118.	2.5	6
128	Ultraviolet doubly excited Fe II lines in the laboratory and in the A-type star 21 Pegasi. Astrophysical Journal, 1987, 312, 337.	4.5	12
129	Experimental and theoretical investigation of radiative lifetimes in neutral gallium. Zeitschrift für Physik D-Atoms Molecules and Clusters, 1986, 3, 345-351.	1.0	14
130	Correlation in the 2s2ndRydberg series of F vi. Physical Review A, 1986, 34, 4399-4401.	2.5	0
131	J-Dependent 3s4p3P Lifetimes in Mg-Like Sulphur and Chlorine. Physica Scripta, 1984, 30, 249-254.	2.5	32