Abhijit Mookerjee

List of Publications by Year
in descending order

Source: https://exaly.com/author-pdf/4466955/publications.pdf

Version: 2024-02-01

103	2,007	471509	254184
papers	citations	17 h-index	43 g-index

103	103	103	1670
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Electronic structure, chemical bonding, and optical properties of paraelectricBaTiO3. Physical Review B, 2000, 62, 8828-8834.	3.2	1,027
2	Structural and optical properties of paraelectric SrTiO3. Journal of Physics Condensed Matter, 2000, 12, 3325-3336.	1.8	71
3	Generalized augmented-space theorem for correlated disorder and the cluster-coherent-potential approximation. Physical Review B, 1993, 48, 17724-17731.	3.2	56
4	Mean-field theories of spin glasses. Physics Reports, 1984, 114, 1-98.	25.6	54
5	Augmented-space recursive method for the study of short-ranged ordering effects in binary alloys. Physical Review B, 1994, 50, 13267-13275.	3.2	52
6	Study of electronic structure and elastic properties of transition metal and actinide carbides. Physica B: Condensed Matter, 2005, 367, 6-18.	2.7	37
7	Electronic structure of random binary alloys. Journal of Physics Condensed Matter, 1996, 8, 1979-1996.	1.8	36
8	Magnetic properties of Xâ€“Pt (X = Fe,Co,Ni) alloy systems. Journal of Physics Condensed Matter, 2004, 16, 2317-2334.	1.8	33
9	A real-space study of random extended defects in solids: Application to disordered Stoneâ€“Wales defects in graphene. Physica E: Low-Dimensional Systems and Nanostructures, 2014, 61, 191-197.	2.7	29
10	The effects of local lattice distortion in non-isochoric alloys: CuPd and CuBe. Journal of Physics Condensed Matter, 1996, 8, 2915-2927.	1.8	26
11	Magnetic transition in NiPt alloy systems: experiment and theory. Journal of Magnetism and Magnetic Materials, 2005, 292, 234-240.	2.3	26
12	Electronic and optical properties of ZnIn2Te4. Physica B: Condensed Matter, 2004, 348, 382-390.	2.7	24
13	Augmented-space recursive technique for the analysis of alloy phase stability in random binary alloys. Physical Review B, 1995, 51, 3413-3421.	3.2	22
14	Structural, electronic and magnetic properties of Cr-doped (ZnTe)12 clusters. Journal of Magnetism and Magnetic Materials, 2009, 321, 235-240.	2.3	21
15	Exploring the role of electronic structure on photo-catalytic behavior of carbon-nitride polymorphs. Carbon, 2020, 168, 125-134.	10.3	19
16	Stabilization of ferromagnetism in Mn doped ZnO with C co-doping. Journal of Magnetism and Magnetic Materials, 2009, 321, 273-276.	2.3	18
17	High-pressure studies of MgTe using first-principle electronic-structure calculations. Physical Review B, 1999, 60, 11846-11847.	3.2	17
18	Study of phase stability in NiPt systems. Journal of Physics Condensed Matter, 2003, 15, 1029-1046.	1.8	17

#	Article	IF	Citations
19	Electronic and magnetic properties of disordered Feâ€“Cr alloys using different electronic structure methods. Journal of Physics Condensed Matter, 2008, 20, 445201.	1.8	17
20	Nitrogen absorption and dissociation on small Tantalum clusters. Physica B: Condensed Matter, 2010, 405, 3940-3942.	2.7	17
21	STUDY OF SMALL METALLIC NANOPARTICLES: AN AB-INITIO FULL-POTENTIAL MUFFIN-TIN ORBITALS BASED MOLECULAR DYNAMICS STUDY OF SMALL Cu CLUSTERS. International Journal of Modern Physics B, 2003, 17, 2061-2075.	2.0	15
22	An augmented-space recursive method for the study of concentration profiles at CuNi alloy surfaces. Journal of Physics Condensed Matter, 1996, 8, 4125-4137.	1.8	13
23	Study of transition metal aluminide alloys. Journal of Physics Condensed Matter, 1997, 9, 3529-3541.	1.8	12
24	Effect of short-range order on electronic and magnetic properties of disordered Co-based alloys. Journal of Magnetism and Magnetic Materials, 2001, 234, 100-113.	2.3	12
25	Phase stability analysis in Feâ€“Pt and Coâ€“Pt alloy systems: an augmented space study. Journal of Physics Condensed Matter, 2004, 16, 7247-7260.	1.8	12
26	Magnetism in NiFeMo disordered alloys: Experiment and theory. Physica B: Condensed Matter, 2010, 405, 4287-4293.	2.7	11
27	Optical properties of perovskite alkaline-earth titanates: a formulation. Journal of Physics Condensed Matter, 2002, 14, 3849-3863.	1.8	10
28	Phase stability and magnetism in NiPt and NiPd alloys. Journal of Physics Condensed Matter, 2004, 16, 5791-5802.	1.8	10
29	Electronic structure and optical properties of ordered compounds potassium tantalate and potassium niobate and their disordered alloys. Physica B: Condensed Matter, 2012, 407, 4615-4621.	2.7	10
30	Effect of short range ordering on the magnetism in disordered Fe:Al alloy. Journal of Alloys and Compounds, 2014, 613, 306-311.	5.5	10
31	Effects of chemical ordering and composition on the magnetic properties of disordered FeAl alloys. Journal of Alloys and Compounds, 2015, 639, 583-587.	5.5	10
32	Analysis of stochastic resonances in a two-dimensional quantum percolation model. Physical Review B, 1993, 47, 3097-3104.	3.2	8
33	Magnetic properties of Ni-Mo single-crystal alloys; theory and experiment. Journal of Physics Condensed Matter, 1998, 10, 11773-11780.	1.8	8
34	Symmetry reduction in the augmented space recursion formalism for random binary alloys. Journal of Physics Condensed Matter, 2004, 16, 1409-1423.	1.8	8
35	An augmented space approach to the study of random ternary alloys: I. Electronic structure with uncorrelated disorder and short ranged order. Journal of Physics Condensed Matter, 2009, 21, 195503.	1.8	8
36	Structure, reactivity and electronic properties of Mn doped clusters. Physica B: Condensed Matter, 2013, 419, 86-89.	2.7	8

#	Article	IF	Citations
37	Conductance of disordered graphene sheets: A real space approach. Physica E: Low-Dimensional Systems and Nanostructures, 2015, 74, 347-354.	2.7	8
38	Cluster coherent-potential approximation in ternary random alloys. Physical Review B, 1988, 38, 3798-3802.	3.2	7
39	Self-consistent cluster coherent-potential approximation for the tight-binding linearized-muffin-tin-orbitals approach to random binary alloys. Physical Review B, 1993, 48, 8567-8571.	3.2	7
40	A phase-stability study of PdRh alloys. Journal of Physics Condensed Matter, 1997, 9, 2179-2186.	1.8	7
41	Magnetism in surfaces: an orbital-resolved study. Journal of Magnetism and Magnetic Materials, 2005, 285, 210-223.	2.3	7
42	AUGMENTED SPACE RECURSION CODE AND APPLICATION IN SIMPLE BINARY METALLIC ALLOY. International Journal of Modern Physics C, 2010, 21, 205-220.	1.7	7
43	A new class of coupled continuum equations for atomic growth on surfaces. Journal of Physics Condensed Matter, 1999, 11, 4367-4380.	1.8	6
44	Electrical and magnetic properties of AuFe alloys. Journal of Physics Condensed Matter, 1999, 11, 1833-1846.	1.8	6
45	Augmented-space recursion for partially disordered systems. Journal of Physics Condensed Matter, 2001, 13, 10149-10157.	1.8	6
46	A study of the convergence of the recursion method for metals and compounds. Journal of Physics Condensed Matter, 2002, 14, 3211-3219.	1.8	6
47	Optical properties of random alloys: application to CuAu and NiPt. Journal of Physics Condensed Matter, 2005, 17, 4559-4566.	1.8	6
48	Lattice thermal conductivity of disordered NiPd and NiPt alloys. Journal of Physics Condensed Matter, 2006, 18, 4589-4608.	1.8	6
49	A local-density approximation for the exchange energy functional for excited states: The band-gap problem. Physica B: Condensed Matter, 2009, 404, 1137-1142.	2.7	6
50	Ab initiostudy of the phonon spectrum, entropy and lattice heat capacity of disordered Reâ€“W alloys. Journal of Physics Condensed Matter, 2012, 24, 375401.	1.8	6
51	Magnetism on rough surfaces of Fe, Co and Ni : An augmented space approach. Superlattices and Microstructures, 2015, 86, 173-185.	3.1	6
52	Effect of disorder on the optical response of NiPt and Ni3Pt alloys. Computational Materials Science, 2017, 140, 1-9.	3.0	6
53	Quantum percolation and breakdown. Absence of the delocalisation transition in two dimensions. Physica A: Statistical Mechanics and Its Applications, 1992, 186, 258-269.	2.6	5
54	Electronic structure of ternary random alloys. Journal of Physics Condensed Matter, 1997, 9, 6607-6618.	1.8	5

#	Article	IF	Citations
55	TB-LMTO-AUGMENTED SPACE RECURSION FOR RANDOM BINARY ALLOYS: A TRACTABLE REPRESENTATION. Modern Physics Letters B, 1999, 13, 723-733.	1.9	5
56	Diffusion on the Cayley tree. Physical Review B, 1979, 19, 1926-1932.	3.2	4
57	Stochastic resonances and the mobility edge in a three-dimensional tight-binding Anderson model. Physical Review B, 1994, 50, 4867-4870.	3.2	4
58	Spinâ€“orbit coupling: a recursion method approach. Physica B: Condensed Matter, 2004, 351, 63-70.	2.7	4
59	Optical conductivity in disordered alloys: an approach via the augmented space recursion. Journal of Physics Condensed Matter, 2005, 17, 6435-6443.	1.8	4
60	The study of electronic and magnetic properties of the partially disordered pseudo-Heusler alloy Co2Fe0.4Cr0.6Al: An augmented space approach. Journal of Magnetism and Magnetic Materials, 2007, 313, 243-252.	2.3	4
61	Tuning magnetism of MnO by doping with 2p elements. Journal of Magnetism and Magnetic Materials, 2010, 322, 253-256.	2.3	4
62	Magnetism in FeNiW disordered alloys: Experiment and theory. Journal of Magnetism and Magnetic Materials, 2010, 322, 3558-3564.	2.3	4
63	Fe_{3.3}Ni_{83.2}Mo_{13.5}: a likely candidate to show spin-glass behaviour at low temperatures. Journal of Physics Condensed Matter, 2011, 23, 106002.	1.8	4
64	Study of the effect of short ranged ordering on the magnetism in FeCr alloys. Journal of Magnetism and Magnetic Materials, 2014, 349, 156-158.	2.3	4
65	Study of the effect of magnetic ordering on orderâ€“disorder transitions in binary alloys. Journal of Magnetism and Magnetic Materials, 2014, 360, 15-20.	2.3	4
66	A SEMI-EMPIRICAL STUDY OF SMALL COPPER CLUSTERS. Modern Physics Letters B, 1996, 10, 211-221.	1.9	3
67	Calculations on Ni Clusters: An Equivalent Crystal Theory and LCAO Approach. International Journal of Modern Physics B, 1997, 11, 255-262.	2.0	3
68	Magnetism and magnetic asphericity in NiFe alloys. Physics Letters, Section A: General, Atomic and Solid State Physics, 1998, 246, 151-156.	2.1	3
69	Study of a Pair of Coupled Continuum Equations Modeling Surface Growth. International Journal of Modern Physics B, 2003, 17, 2981-2999.	2.0	3
70	Study of phase stability in a class of binary alloys using augmented space recursion based orbital peeling technique. Physica B: Condensed Matter, 2008, 403, 4111-4119.	2.7	3
71	STUDY OF THE ELECTRONIC AND STRUCTURAL PROPERTIES OF ZnO CLUSTERS. International Journal of Modern Physics B, 2010, 24, 3297-3309.	2.0	3
72	A study of magnetism in disordered Ptâ€“Mn, Pdâ€“Mn and Niâ€“Mn alloys: an augmented space recursion approach. Journal of Physics Condensed Matter, 2012, 24, 295501.	1.8	3

#	Article	IF	Citations
73	Interesting magnetic behavior of Fe:Al disordered alloys. Physica B: Condensed Matter, 2014, 448, 226-228.	2.7	3
74	Electronic and magnetic properties at rough and sharp transition metalâ€“metal interfaces: An augmented space approach. Journal of Magnetism and Magnetic Materials, 2015, 381, 422-432.	2.3	3
75	Disorder induced lifetime effects in binary disordered systems: A first principles formalism and an application to disordered graphene. International Journal of Modern Physics B, 2017, 31, 1750218.	2.0	3
76	Increased metallicity of Carbon nanotubes because of incorporation of extended Stone-Walesâ€™ defects: an ab-initio real space approach. Indian Journal of Physics, 2017, 91, 269-276.	1.8	3
77	Simple correction to bandgap problems in IV and IIIâ€“V semiconductors: an improved, local first-principles density functional theory. Journal of Physics Condensed Matter, 2019, 31, 495502.	1.8	3
78	Percolation model, Sherrington-Kirkpatrick model and localization-delocalization model of spin glass transition: A comparative study. Physics Letters, Section A: General, Atomic and Solid State Physics, 1984, 100, 513-515.	2.1	2
79	Random walk and magnetization of spin clusters in spin glasses. American Journal of Physics, 1985, 53, 261-263.	0.7	2
80	Transmittance fluctuations and nonlinearity in random chains in the presence of applied electric fields. Physical Review B, 1994, 50, 5740-5743.	3.2	2
81	Magnetic properties of disordered CoCu alloys: a first-principles approach. Journal of Magnetism and Magnetic Materials, 2000, 214, 291-300.	2.3	2
82	ELECTRONIC STRUCTURE AND GROUND STATE PROPERTIES OF NON-MAGNETIC NiPt SYSTEMS. International Journal of Modern Physics B, 2003, 17, 4447-4456.	2.0	2
83	ELECTRONIC STRUCTURE AND MAGNETISM OF NICKEL THIN FILMS. International Journal of Modern Physics B, 2003, 17, 5839-5848.	2.0	2
84	Ordering in 3dâ€“5d (CuAu) and segregation in 3dâ€“4d (CuAg) systems. Physica B: Condensed Matter, 2005, 366, 55-61.	2.7	2
85	A real space approach to study the effect of off-diagonal disorder on superconductivity. Physica C: Superconductivity and Its Applications, 2010, 470, 640-647.	1.2	2
86	Study of optical response in disordered alloys using the generalized recursion in augmented space: Application to ferromagnetic FeCo alloy. Physica B: Condensed Matter, 2011, 406, 2121-2125.	2.7	2
87	Effect of donor (I) or acceptor (N) co-doping on Cr doped (ZnTe)12 clusters. Journal of Magnetism and Magnetic Materials, 2011, 323, 166-174.	2.3	2
88	Magnetic transitions in Ni1â^'xMox and Ni1â^'xWx disordered alloys. Journal of Magnetism and Magnetic Materials, 2011, 323, 2478-2482.	2.3	2
89	Internal geometry of delocalised and localised states in a one-dimensional, continuous quasi-periodic potential. Physica A: Statistical Mechanics and Its Applications, 1992, 189, 390-402.	2.6	1
90	A Molecular Full-Potential LMTO Calculation for Copper Clusters. Modern Physics Letters B, 1997, 11, 161-169.	1.9	1

#	Article	IF	Citations
91	Effect of alloying on the electronic structure and magnetic properties of Fe, Co and Ni with Au and Ag. Bulletin of Materials Science, 2003, 26, 199-205.	1.7	1
92	DETERMINATION OF THE GROUND-STATE GEOMETRIES OF COPPER CLUSTERS BY SIMULATED ANNEALING WITHIN AN EQUIVALENT CRYSTAL APPROACH. International Journal of Modern Physics B, 2003, 17, 273-279.	2.0	1
93	An augmented space approach to the study of random ternary alloys: II. Optical response. Journal of Physics Condensed Matter, 2009, 21, 195504.	1.8	1
94	AN AUGMENTED SPACE-BASED CLUSTER COHERENT POTENTIAL APPROXIMATION: APPLICATION TO CuAu AND NiAl ALLOYS. International Journal of Modern Physics B, 2011, 25, 735-745.	2.0	1
95	Study of Spin Glass Behavior in Disordered PtxMn1âˆ’x Alloys: An Augmented Space Recursion Approach. Advanced Science Letters, 2015, 21, 2681-2687.	0.2	1
96	Multichannel scattering in a 1D disordered chain. Waves in Random and Complex Media, 1993, 3, 1-8.	1.5	0
97	STUDY OF DOPING EFFECT ON THE ELECTRONIC STRUCTURE OF Sr1âˆ’xLaxTiO3. Modern Physics Letters B, 1996, 10, 505-514.	1.9	0
98	Determination of the Ground State Geometries of Copper Clusters by Simulated Annealing. International Journal of Modern Physics B, 1997, 11, 2333-2341.	2.0	0
99	OPTICAL PROPERTIES OF RANDOM IIIâ€“V TERNARY SEMICONDUCTING ALLOYS. International Journal of Modern Physics B, 2002, 16, 3681-3695.	2.0	0
100	STUDY OF A PAIR OF COUPLED CONTINUUM EQUATIONS MODELING SURFACE GROWTH: INTERPLAY BETWEEN SURFACE DIFFUSION, DESORPTION-ACCRETION AND SCHWOEBEL BACK DIFFUSION. International Journal of Modern Physics B, 2004, 18, 1549-1569.	2.0	0
101	Study of phase stability of MnCr using the augmented space recursion based orbital peeling technique. Physica B: Condensed Matter, 2009, 404, 1979-1983.	2.7	0
102	Study of disorderâ€“order transitions in FexAl1âˆ’x binary alloys using the augmented space recursion based orbital peeling technique. Physica B: Condensed Matter, 2011, 406, 3810-3815.	2.7	0
103	Electronic and magnetic properties of disordered AuCr alloys: A first-principles study. Journal of Magnetism and Magnetic Materials, 2013, 332, 199-204.	2.3	0