

## PUBLICATIONS

Prior to Joining CU: 1-49	Since Joining CU: 50-175	Contribution; Impact Factor
1	“Condensation Transition in the One-Dimensional Extended Hubbard Model”, <b>H. Q. Lin</b> and J. E. Hirsch, Phys. Rev. B <b>33</b> , 8155 (Jun 1986).	50%; 3.185
2	“Monte Carlo versus Langevin Methods for Nonpositive Definite Weights”, <b>H. Q. Lin</b> and J. E. Hirsch, Phys. Rev. B <b>34</b> , 1964 (Aug 1986).	50%; 3.185
3	“Monte Carlo Study of the Alexander-Anderson Model”, J. E. Hirsch and <b>H. Q. Lin</b> , J. Appl. Phys. <b>61</b> , 3703 (Apr 1987).	50%; 2.498
4	“On the Static Approximation for the Hubbard Hamiltonian”, <b>H. Q. Lin</b> and J. E. Hirsch, J. Appl. Phys. <b>61</b> , 3706 (Apr 1987).	50%; 2.498
5	“Two-Dimensional Hubbard Model with Nearest- and Next-Nearest-Neighbor Hopping”, <b>H. Q. Lin</b> and J. E. Hirsch, Phys. Rev. B <b>35</b> , 3359 (Mar 1987).	50%; 3.185
6	“Interaction between Localized Moments in Metals: A Monte Carlo Study”, J. E. Hirsch and <b>H. Q. Lin</b> , Phys. Rev. B <b>35</b> , 4943 (Apr 1987).	50%; 3.185
7	“Magnetic Properties of a Degenerate Anderson Impurity”, <b>H. Q. Lin</b> and J. E. Hirsch, Phys. Rev. B <b>37</b> , 1864 (Feb 1988).	50%; 3.185
8	“Pairing in the Two-Dimensional Hubbard Model: A Monte Carlo Study”, J. E. Hirsch and <b>H. Q. Lin</b> , Phys. Rev. B <b>37</b> , 5070 (Apr 1988).	50%; 3.185
9	“Pairing in the Two-Dimensional Hubbard Model: An Exact Diagonalization Study”, <b>H. Q. Lin</b> , J. E. Hirsch, and D. J. Scalapino, Phys. Rev. B <b>37</b> , 7359 (May 1988).	40%; 3.185
10	“The Ground State of the Two-Dimensional Antiferromagnetic Heisenberg Model and the Resonating-Valence-Bond States”, S. Tang and <b>H. Q. Lin</b> , Phys. Rev. B <b>38</b> , 6863 (Oct 1988).	50%; 3.185
11	“Ground State Energy of Spin-1/2 and Spin-1 Chain: XY Model”, C. Y. Pan and <b>H. Q. Lin</b> , J. Appl. Phys. <b>64</b> , 5932 (Nov 1988).	50%; 2.498
12	“Renormalization Group Study of the Anisotropic and Alternating Heisenberg Antiferromagnets”, <b>H. Q. Lin</b> and C. Y. Pan, J. Physique , <b>C8</b> , 1415 (Dec 1988).	50%; NA
13	“A Theory of One and Two Holes in Antiferromagnetic $CuO_2$ ”, D. C. Mattis, C. Y. Pan, and <b>H. Q. Lin</b> , J. Phys.: Condens. Matter <b>1</b> , 135 (Jan 1989).	35%; 2.145
14	“Spin-1 XXZ Model on the Square Lattice”, <b>H. Q. Lin</b> and V. J. Emery, Phys. Rev. B <b>40</b> ( <i>Rapid Comm</i> ), 2730 (Aug 1989).	50%; 3.185
15	“Phase Separation in the $t - J$ Model”, V. J. Emery, S. A. Kivelson, and <b>H. Q. Lin</b> , Phys. Rev. Lett. <b>64</b> , 475 (Jan 1990).	33%; 7.489
16	“Phase Separation of Holes in Antiferromagnets”, V. J. Emery, S. A. Kivelson, and <b>H. Q. Lin</b> , Physica B <b>163</b> , 306 (Apr 1990). ( <i>invited</i> )	33%; 0.796
17	“Doped Antiferromagnets in the Weak-Hopping Limit”, S. A. Kivelson, V. J. Emery, and <b>H. Q. Lin</b> , Phys. Rev. B <b>42</b> , 6523 (Oct 1990).	30%; 3.185

- 18 “Exact Diagonalization of the Quantum Spin Models”,  
**H. Q. Lin**, Phys. Rev. B **42**, 6561 (Oct 1990). **100%; 3.185**
- 19 “Spin-Spin Correlations in The Spin-1/2 AFH Chain”,  
**H. Q. Lin** and D. K. Campbell, J. Appl. Phys. **69**, 5947 (Apr 1991). **66%; 2.498**
- 20 “Phase Diagram of Anisotropic Two-Dimensional Quarter-Filled  
Band of Interacting Electrons”,  
S. Mazumdar, **H. Q. Lin**, and D. K. Campbell, in *Organic Superconductivity*,  
edited by V. Kresin and W. Little. (Plenum Press, June 1991). **33%; NA**
- 21 “Quantum Monte Carlo Study of the One-Dimensional Extended Hubbard Hamiltonian”,  
W. R. Somsy, D. K. Campbell, J. E. Gubernatis, **H. Q. Lin**, and X. D. Wang,  
*Synthetic Metals*, Vol. **41-43**, 3531 (Apr 1991). **15%; 1.320**
- 22 “A Three-Dimensional, Tight-Binding Model For trans-Polyacetylene”,  
X. D. Wang, D. K. Campbell, **H. Q. Lin**, and P. Vogl,  
*Synthetic Metals*, Vol. **41-43**, 3567 (Apr 1991). **20%; 1.320**
- 23 “The Phase Diagram of 2:1 Cationic Organic Charge Transfer Salts”,  
S. Mazumdar, **H. Q. Lin**, and D. K. Campbell,  
*Synthetic Metals*, Vol. **41-43**, 4047-4050 (Apr 1991). **33%; 1.320**
- 24 “Dilute Gas of Electron Pairs in the  $t - J$  Model”,  
**H. Q. Lin**, Phys. Rev. B **44**, 4674 (Sep 1991). **100%; 3.185**
- 25 “Ground State Properties of the Two-Dimensional Hubbard Model”,  
**H. Q. Lin**, Phys. Rev. B **44** (*Rapid Communication*), 7151 (Oct 1991). **100%; 3.185**
- 26 “Staggered Field Induced Hole Pairing in One-Dimensional Correlated Systems”,  
J. Bonca, P. Prelovsek, I. Sega, **H. Q. Lin**, and D. K. Campbell,  
Phys. Rev. Lett. **69**, 526 (July 1992). **20%; 7.489**
- 27 “Triplet States and Optical Absorptions in Finite Polyenes and Conjugated Polymers”,  
D. K. Campbell, J. T. Gammel, **H. Q. Lin**, and E. Y. Loh, Jr.,  
*Synthetic Metals*, Vol. **49-50**, 631 (Aug 1992). (**invited**) **20%; 1.320**
- 28 “Long-Range-Order in the 2-D Antiferromagnetic Heisenberg Model:  
A Renormalization Perspective”,  
**H. Q. Lin** and D. K. Campbell, Phys. Rev. Lett. **69**, 2415 (Oct 1992). **75%; 7.489**
- 29 “Metal-Insulator Transitions and Electron-Phonon Interactions in Organic Conductors”,  
K. C. Ung, S. Mazumdar, D. K. Campbell, and **H. Q. Lin**,  
*Synthetic Metals*, Vol **57**, 4660 (Apr 1993). **20%; 1.320**
- 30 “One-Dimensional  $t - J$  and Hubbard Models in a Staggered Field”,  
P. Prelovsek, I. Sega, J. Bonca, **H. Q. Lin**, and D. K. Campbell,  
Phys. Rev. B **47**, 12224 (May 1993). **20%; 3.185**
- 31 “Small Cluster Studies of the Lattice Anderson Model”,  
J. Callaway, D. G. Kanhere, and **H. Q. Lin**, J. Appl. Phys. **73**, 5406 (May 1993). **30%; 2.498**
- 32 “A Renormalization Group Study of The 2-D Antiferromagnetic Heisenberg Model”,  
**H. Q. Lin**, D. K. Campbell, and C. Y. Pan, J. Appl. Phys. **73**, 6102 (May 1993). **50%; 2.498**
- 33 “Exact Diagonalization Methods for Quantum Systems”,  
**H. Q. Lin** and J. E. Gubernatis, Comput. Phys. **7**, 400 (July 1993). (**invited**) **75%; NA**

- 34 “Exact Diagonalization Studies of the Spectral Weight Functions and the Density of States of the Lattice Anderson Model”, J. Callaway, J. W. Kim, L. Tan, and **H. Q. Lin**, Phys. Rev. B **48**, 11545 (Oct 1993). **25%; 3.185**
- 35 “SU(2) to U(1) Microscopic Transition in the Heisenberg Chain”, J. M. P. Carmelo and **H. Q. Lin**, Mod. Phys. Lett. B **7**, 1387 (Oct 1993). **40%; 1.079**
- 36 “Spin Wave Theory Study of Renormalized 2-D Antiferromagnetic Heisenberg Model”, **H. Q. Lin**, Y. C. Cheng, and C. Y. Pan, Chinese Journal of Physics **32**, 87 (Feb 1994). **50%; 0.290**
- 37 “A Massively Parallel Supercomputing for Electromagnetic Modeling”, C. Y. Pan, Thomas Timmerman, and **H. Q. Lin**, Proceedings of the Conference of High Performance Computing’94, Eds. Tentner and Stevens, p.200 - p.207 (Mar 1994). **20%; NA**
- 38 “Magnetic Properties of the Lattice Anderson Model”, **H. Q. Lin**, H. Chen, and J. Callaway, J. Appl. Phys. **75**, 7041 (May 1994). **50%; 2.498**
- 39 “Exact Diagonalization Studies of the Lattice Anderson Model on a Four-site Cluster”, J. Callaway, J. W. Kim, L. Tan, **H. Q. Lin**, and H. Chen, Physica B **199**, 316 (Jun 1994). **20%; 0.796**
- 40 “Perturbative Calculation of the Lattice Anderson Model”, **H. Q. Lin**, Y. C. Cheng, and J. W. Chen, Proceedings of the 9th Conference on Magnetism and Magnetic Technologies, 48 (July 1994). **50%; NA**
- 41 “A Renormalization Group Analysis of Long-Range-Order in the 2-D Antiferromagnetic Heisenberg Model”, **H. Q. Lin**, D. K. Campbell, Y. C. Cheng, and C. Y. Pan, Phys. Rev. B **50**, 12702 (Nov 1994). **50%; 3.185**
- 42 “Pseudoparticle Description of an Interacting Bosonic Gas”, A. H. Castro Neto, **H. Q. Lin**, Y. H. Chen, and J. M. P. Carmelo, Phys. Rev. B **50**, 14032 (Nov 1994). **25%; 3.185**
- 43 “Studies of the Lattice Anderson Model”, Y. C. Cheng, J. W. Chen, and **H. Q. Lin**, J. Mag. Mag. Mat. **140**, 1603 (Feb 1995). **33%; 0.985**
- 44 “Off-diagonal Interactions and Pair-Binding in Superconducting Fullerenes”, D. K. Campbell, M. P. Gelfand, **H. Q. Lin**, and S. L. Sondhi, *Synthetic Metals*, Vol **70**, 1523 (Mar 1995). **20%; 1.320**
- 45 “A Unified Renormalization Group Study to the 1-D Ising Model with Transverse Field”, C. Y. Pan and **H. Q. Lin**, Mod. Phys. Lett. B **9**, 103 (Jan 1995). **50%; 1.079**
- 46 “Off-diagonal Interactions, Hund’s Rules and Pair-binding in Hubbard Molecules”, S.L. Sondhi, M. P. Gelfand, **H. Q. Lin**, and D. K. Campbell, Phys. Rev. B **51**, 5943 (Mar 1995). **25%; 3.185**
- 47 “The Phase Diagram of the One-Dimensional Extended Hubbard Model,” **H. Q. Lin**, E. Gagliano, D. K. Campbell, E. H. Fradkin, and J. E. Gubernatis, in *The Hubbard Model: Its Physics and Mathematical Physics*, pp. 315-327, D. Baeriswyl *et al.* eds., (Plenum Press, 1995). **50%; invited**
- 48 “A Renormalization-Group Study of the Haldane Gap Antiferromagnets”, C. Y. Pan and **H. Q. Lin**, IEEE Trans. on Magnetics, Vol. 31, No. 6, 4139-4141 (1995). **50%; 0.791**
- 49 “Pairing in a tight-binding model with occupation-dependent hopping rate: exact diagonalization study”, **H. Q. Lin** and J. E. Hirsch, Phys. Rev. B **52**, 16155 (Dec 1995). **50%; 3.185**

- 50 “Anomalous Charge Excitation Spectra in the t-J Model”,  
T. K. Lee, R. Eder, Y. C. Chen, **H. Q. Lin**, Y. Ohta, and C. T. Shih,  
Proceedings of 10th Anniversary HTS Workshop on Physics,  
Materials and Applications, March, 1996. **15%; Not SCI**
- 51 “Jahn-Teller Effects in the Doubly Degenerate Hubbard Model”,  
**H. Q. Lin**, J. Appl. Phys. **81**, 4625-4627 (Apr 1997). **100%; 2.498**
- 52 “Systematic Scaling in the Low Energy Excitations of the t-J Model  
in One and Two Dimensions”,  
R. Eder, Y. C. Chen, **H. Q. Lin**, Y. Ohta, C. T. Shih, and T. K. Lee,  
Phys. Rev. B **55**, 12313-12317 (May 1997). **15%; 3.185**
- 53 “Effect of inter-site electron - electron interaction on the spin and charge density  
in interchain coupled organic ferromagnets”,  
W. Z. Wang, K. L. Yao, and **H. Q. Lin**, Euro. Phys. Lett. **38** 539-544 (Jun 1997). **25%; 2.237**
- 54 “A Theoretical Model for Interchain Coupled Organic Ferromagnets”,  
W. Z. Wang, K. L. Yao, and **H. Q. Lin**, Chem. Phys. Lett. **274**, 221-225 (Aug 1997). **25%; 2.438**
- 55 “Polaronic Excitations in the Doped Polyacene”  
Z. J. Li, **H. Q. Lin**, and K. L. Yao, Z. Phys. B **104**, 77-80, (Aug 1997). **40%; 1.647**
- 56 “Phase Separation in the 1-D Extended Hubbard Model”,  
**H. Q. Lin**, E. Gagliano, and D. K. Campbell, Physica C **282**, 1875-1876 (Aug 1997). **66%; 0.948**
- 57 “Phase Separation in the One-Dimensional  $t - V$  Model”,  
Y. C. Chen and **H. Q. Lin**, Physica C **282**, 1871-1872 (Aug 1997). **50%; 0.948**
- 58 “Low density electron pairs in the extended Hubbard model”,  
**H. Q. Lin**, W. C. Lau, and W. Y. Chen, *Synthetic Metals*, Vol. **90**, 77-79, (Oct 1997). **75%; 1.320**
- 59 “Composite Polaron in Ferromagnetic Narrow-Band Metallic Manganese-Oxides”,  
L.J. Zou, **H. Q. Lin**, and Q.Q. Zheng,  
J. Phys.: Condens. Matter **9**, 8623-8630 (Oct 1997). **40%; 2.145**
- 60 “Ground State of the Double Exchange Model”,  
L.J. Zou, Q.Q. Zheng, and **H. Q. Lin**, Phys. Rev. B **56**, 13669-13672 (Dec 1997). **40%; 3.185**
- 61 “Charge Density Wave Transition and Instability in Interchain Coupled Organic  
Ferromagnets with Next-Nearest-Neighbor Hopping Interaction”,  
W. Z. Wang, K. L. Yao, and **H. Q. Lin**, J. Chem. Phys. **108**, 2867-2872 (Feb 1998). **33%; 3.138**
- 62 “The Charge Density Wave and Spin Density Wave in Interchain Coupled  
Alternate  $\pi$ -conjugated Organic Ferromagnets”,  
W. Z. Wang, K. L. Yao, and **H. Q. Lin**,  
J. Phys.: Condens. Matter **10**, 1371-1379 (Feb 1998). **33%; 2.145**
- 63 “Anomalous Low-energy Charge Excitation Spectra in the Hubbard and t-J Model”,  
Y.C. Chen, R. Eder, **H. Q. Lin**, Y. Ohta, C. T. Shih, and T. K. Lee,  
Proceedings of Inauguration Conference of Asia Pacific Center for Theoretical Physics on Current  
Topics in Physics (June 4-10, 1996 Seoul) ed. C. N. Yang, Y. M. Cho, and J. B. Hong (World Scientific),  
March 1998. **15%; Not SCI**
- 64 “Ground State Properties of High-Spin  $Mn_{12}O_{12}$  Molecule in Organic Compound”,  
S.Y. Wang, L.J. Zou, X.G. Gong, Q.Q. Zheng, and **H. Q. Lin**,  
J. Appl. Phys. **83**, 7100-7102 (Jun 1998). **5%; 2.498**

- 65 “Composite Polaron Mechanism for Colossal Magnetoresistance in Perovskite Manganites”,  
L.J. Zou, **H. Q. Lin**, and Q.Q. Zheng, *J. Appl. Phys.* **83**, 7363-7365 (Jun 1998). **40%; 2.498**
- 66 “Solitons in Quasi-One-Dimensional  $\pi$ -conjugated Organic Ferromagnets”,  
W.Z. Wang, K.L. Yao, and **H. Q. Lin**, *Phys. Lett. A* **243**, 91-94 (Jun 1998). **33%; 1.550**
- 67 “d-Wave Pairing Correlation in the the Two-Dimensional t-J Model”,  
C. T. Shih, Y. C. Chen, **H. Q. Lin**, and T. K. Lee,  
*Phys. Rev. Lett.* **81**, 1294-1297 (Aug 1998). **25%; 7.489**
- 68 “Effects of electron-electron interactions on the ferromagnetic state  
in organic polaronic ferromagnet”  
Z. Fang, **H. Q. Lin**, and K. L. Yao, *Phys. Stat. Sol. B* **209**, 173-178 (Sep 1998). **33%; 0.862**
- 69 “Double-Time Green’s Function Approach to the Two-Dimensional Heisenberg  
Antiferromagnet with Broken Bonds”,  
Yun Song, **H. Q. Lin**, and Jue-Lian Shen, *Phys. Rev. B* **58**, 9166-9170 (Oct 1998). **50%; 3.185**
- 70 “The pair of solitons-like distortion in organic ferromagnetic conjugated polymer”,  
Z.J. Li, **H. Q. Lin**, Z. An, and K. L. Yao, *J. Chem. Phys.* **109**, 10082-10086 (Dec 1998). **33%;3.138**
- 71 “Interchain alignments and ground state in organic ferromagnets”,  
W. Z. Wang, K. L. Yao, and **H. Q. Lin**, *Modern Physics Letters B* **12**, 1167 (1998). **25%; 0.621**
- 72 “The kink distortion in quasi-one-dimensional conjugated polymer with a side radical”,  
Z. J. Li, **H. Q. Lin**, Z. An, and K. L. Yao, *J. Phys. Soc. Jpn.* **68** 190-193 (Jan 1999). **33%; 1.760**
- 73 “Phase Separation and Phase Diagram in Lightly Doped Manganites:  
Temperature and Magnetic Field Effects”,  
L.J. Zou and **H. Q. Lin**, *Australian Journal of Physics* **52**, 247-254 (Mar 1999). **50%; 0.616**
- 74 “CDW transition and instability in interchain coupled organic ferromagnets  
with next-nearest neighboring hopping interaction”,  
W. Z. Wang, K. L. Yao, and **H. Q. Lin**, *Phys. Stat. Sol. B* **212**, 175-183 (Mar 1999). **25%; 0.836**
- 75 “Electronic Structure of  $\text{PrBa}_2\text{Cu}_3\text{O}_7$  and  $\text{YBa}_2\text{Cu}_3\text{O}_7$ : A LSDA+U Study”,  
M.C. Qian, W.Y. Hu, Q.Q. Zheng, and **H. Q. Lin**, *J. Appl. Phys.* **85**, 4765-4767 (Apr 1999). **20%;  
2.498**
- 76 “Hydrostatic Pressure Effect in  $\text{La}_{1-x}\text{Ca}_x\text{MnO}_3^*$ ”,  
J.W. Liu, Z. Zeng, Q.Q. Zheng, H.K. Wong, and **H. Q. Lin**,  
*J. Appl. Phys.* **85**, 5426-5428 (Apr 1999). **20%; 2.498**
- 77 “Order Parameter in the Antiferromagnetic Heisenberg Model”,  
**H. Q. Lin** and W. Y. Chen, *J. Phys. Soc. Jpn.* **68**, 1699-1702 (May 1999). **80%; 1.760**
- 78 “Electronic transmission properties in a mesoscopic necklace with inhomogeneous magnetic flux”,  
Zhiwen Pan, C. D. Gong, M. H. Lung, and **H. Q. Lin**,  
*Phys. Rev. E* **59**, 6010-6016 (May 1999). **20%; 2.418**
- 79 “The electronic structure of  $\text{CaCuO}_2$  and  $\text{SrCuO}_2$ ”,  
H. Wu, Q. Q. Zheng, X. G. Gong, and **H. Q. Lin**,  
*J. Phys.: Condens. Matter* **11**, 4637-4646 (Jun 1999). **10%; 2.145** **No**
- 80 “Effect of interchain order on stability of ferromagnetic ground state in organic ferromagnets”,  
W.Z. Wang, **H. Q. Lin**, and K.L. Yao, *Synthetic Metals*, Vol. **103**, 2331-2332 (Jun 1999). **33%;  
1.320**

- 81 “Four-fold structural distortion in quasi-1D organic ferromagnets”,  
Z.J. Li, **H. Q. Lin**, and K. L. Yao, *Synthetic Metals*, Vol. **103**, 2329-2330 (Jun 1999). **33%**; **1.320**
- 82 “Improved Finite-Lattice Estimates of the Properties of Two Quantum Spin Models on the Infinite Square Lattice”  
D.D. Betts, **H. Q. Lin**, and J.S. Flynn, *Can. J. Phys.* **77**, 353-369 (May 1999). **33%**; **0.581**
- 83 “Finite Temperature Properties of The Frustrated  $J_1$ - $J_2$  Model”,  
Jie Yang, Jue-lian Shen, and **H. Q. Lin**, *J. Phys. Soc. Jpn.* **68**, 2384-2389 (July 1999). **33%**; **1.760**
- 84 “Interchain Order and Ferromagnetic State in Organic Ferromagnets”,  
W. Z. Wang, K. L. Yao, **H. Q. Lin**, and H. T. Li, *Chin. Phys. Lett.* **16**, 538 (1999). **5%**; **1.276**
- 85 “Effective transfer integrals for the Jahn-Teller distortion in  $\text{LaMnO}_3$ ”,  
J. W. Liu, Z. Zeng, Q. Q. Zheng, and **H. Q. Lin**, *Phys. Rev. B* **60**, 12968 (1999). **15%**; **3.185**
- 86 “Frustration Effects in the Two-Dimensional Hubbard Model”,  
**H. Q. Lin** and Jun Li, *Int. J. Mod. Phys. B* **13**, 3552-3554 (Dec 1999). **75%**; **0.381**
- 87 “Numerical Studies of the Double Exchange Model”,  
C. K. Wong and **H. Q. Lin**, *Int. J. Mod. Phys. B* **13**, 3835-3859 (Dec 1999). **MPhil**; **0.381**
- 88 “Boundary conditions, solitons and spin configuration in interchain coupled organic ferromagnetic polymers”,  
W. Z. Wang, K. L. Yao, and **H. Q. Lin**, *J. Chem. Phys.* **112**, 487-491 (Jan 2000). **33%**; **3.138**
- 89 “The transmittance pattern in a non-uniform mesoscopic necklace-like chain”,  
H.L. Mak, **H. Q. Lin**, and C. D. Gong, *J. Appl. Phys.* **87**, 30-35 (Jan 2000). **MPhil**; **2.498**
- 90 “Jahn-Teller Effect and Many-body Correlation Effect in  $\text{LaMnO}_3$ ”,  
W.Y. Hu, M.C. Qian, Q.Q. Zheng, **H. Q. Lin**, and H. K. Wong,  
*Phys. Rev. B* **61**, 1223-1231 (Jan 2000). **25%**; **3.185**
- 91 “Broken Symmetries in the One-Dimensional Extended Hubbard Model”,  
**H. Q. Lin**, D. K. Campbell, and R. T. Clay,  
*Chinese Journal of Physics* **38**, 1-23 (Feb 2000). (*Review Article*) **66%**; **0.440**
- 92 “Bond Operator Analysis of the Magnetization of Spin Chains”,  
Han-Ting Wang, **H. Q. Lin**, and Jue-Lian Shen,  
*Phys. Rev. B* **61**, 4019-4025 (Feb 2000). **33%**; **3.185**
- 93 “Charge dynamics in doped triangular antiferromagnets”,  
W.Q. Yu, S.P. Feng, Z.B. Huang, and **H. Q. Lin**,  
*Phys. Rev. B* **61**, 7409-7414 (Mar 2000). **15%**; **3.185**
- 94 “Exact Ground States and Excited States of Net Spin Models”,  
**H. Q. Lin** and J. L. Shen, *J. Phys. Soc. Jpn.* **69**, 878-882 (Mar 2000). **70%**; **1.760**
- 95 “Field-induced charge generation in electroluminescent polymers”,  
H. Jiang, X.H. Xu, X. Sun, and **H. Q. Lin**, *Thin Solid Films* **363**, 188-190 (Mar 2000). **5%**; **1.16**
- 96 “Anomalous polarization in coupled quantum dots”,  
X.H. Xu, H. Jiang, X. Sun, and **H. Q. Lin**, *Physica B* **279**, 214-216 (Apr 2000). **5%**; **0.796**
- 97 “Thickness dependence of the superconducting transition temperature of  $\text{La}_{2-x}\text{Sr}_x\text{CuO}_4$  films”,  
X. J. Chen, **H. Q. Lin**, and C. D. Gong, *Phys. Rev. B* **61**, 9782-9785 (Apr 2000). **33%**; **3.185**

- 98 “Energy Band Structures of the Low-Dimensional Antiferromagnets  $Sr_2CuO_3$  and  $Sr_2CuO_2Cl_2$ ”,  
Hua Wu, Q.Q. Zheng, and **H. Q. Lin**, J. Appl. Phys. **87**, 4897-4899 (May 2000). **25%; 2.498**
- 99 “Spin Diffusion Dynamics in Double Exchange Manganites”,  
L. J. Zou, D. K. Campbell, and **H. Q. Lin**, J. Appl. Phys. **87**, 5499-5501 (May 2000). **33%; 2.498**
- 100 “Influence of Coulomb interaction and impurity scattering on  
lattice dimerization in one-dimensional system”,  
Y. L. Liu and **H. Q. Lin**, Phys. Rev. B **61**, 12574-12577 (May 2000). **50%; 3.185**
- 101 “Green’s Function Theory to the Two-Dimensional Antiferromagnetic Heisenberg Model  
with Local Magnetic Impurities”,  
Y. Song, **H. Q. Lin**, and A. Sandvik, J. Phys.: Condens. Matter **12**, 5275-5285 (Jun 2000). **33%;  
2.145**
- 102 “Incommensurate domain walls in the two-dimensional Hubbard model with  
next-nearest-neighbor hopping”,  
Jun Li, **H. Q. Lin**, and C. D. Gong, Sol. St. Comm. **115**, 449-451 (July 2000). **33%; 1.489**
- 103 “Pressure Dependence of  $T_c$  in Y-Ba-Cu-O Superconductors”,  
X. J. Chen, **H. Q. Lin**, and C. D. Gong, Phys. Rev. Lett. **85**, 2180-2183 (Sep 2000).  
**corresponding author; 7.489**
- 104 “Thermodynamics of Kondo model with electronic interactions”,  
Shi-Jian Gu, You-Quan Li, and **H. Q. Lin**, J. Phys. A **33**, 6779-6789 (Sep 2000) **20%; 1.566**
- 105 “Influence of intersite  $Cu - O$  repulsion on hole binding and pairing correlations  
in the three-band Hubbard model”,  
Z. B. Huang, **H. Q. Lin**, and J. E. Gubernatis, Physica C**341** 243-244 (Nov 2000). **PhD; 0.948**
- 106 “Strain-induced effect on the superconducting transition temperature of  $La_{2-x}Sr_xCuO_4$  films”,  
**H. Q. Lin**, X. J. Chen, and C.-D. Gong, Physica C**341** 445-446 (Nov 2000). **33%; 0.948**
- 107 “Softened spin wave dispersion and sublattice magnetization at finite temperature  
for a 3D anisotropic Heisenberg antiferromagnet”,  
Jin An, C. D. Gong, and **H. Q. Lin**, J. Phys.: Condens. Matter **13**, 115-122 (Jan 2001). **25%; 2.145**
- 108 “Subgap Absorption and Quantum Lattice Fluctuation in Polymers:  
Effects of the Ground State Degeneracy”,  
J. Zhang, C. Q. Wu, and **H. Q. Lin**, Synthetic Metals **116**, 255-258 (Jan 2001). **20%; 1.320**
- 109 “Stability of the high-spin ground state in the Peierls-extended Hubbard model”,  
Z. B. Huang and **H. Q. Lin**, J. Chem. Phys. **114**, 3284-3292 (Feb 2001). **PhD; 3.138**
- 110 “Pairing, charge, and spin correlations in the three-band Hubbard model”,  
Z. B. Huang, **H. Q. Lin**, and J. E. Gubernatis, Phys. Rev. B **63**, 115112 (Mar 2001). **PhD; 3.185**
- 111 “Competition between two ordering processes in two-dimensional doped antiferromagnets”,  
Jin An, C. D. Gong, and **H. Q. Lin**, Chin. Phys. Lett. **18**, 419-421 (Mar 2001). **20%; 1.276**
- 112 “Peierls Bond Distortion in Substituted Polyacetylenes”,  
C. Q. Wu, Y. Z. Zhang, and **H. Q. Lin**, Synthetic Metals **119**, 219-220 (Mar 2001). **25%; 1.320**
- 113 “Quantum Metal-Insulator Transition at Half-filling”,  
**H. Q. Lin** and C. Q. Wu, Synthetic Metals **119**, 231-232 (Mar 2001). **50%; 1.320**
- 114 “Theory of the magnetic-field-induced metal-insulator transition”,  
Jin An, C. D. Gong, and **H. Q. Lin**, Phys. Rev. B **63**, 174434- (May 2001). **40%; 3.185**

- 115 “Electronic structure and magnetic properties of Ni clusters”,  
H. M. Duan, X. G. Gong, Q. Q. Zheng, and **H. Q. Lin**,  
J. Appl. Phys. **89**, 7308-7310 (Jun 2001). **15%; 2.498**
- 116 “Effect of spin modulation on electronic phase separation in  
double exchange model with Coulomb repulsion”,  
L. J. Zou, **H. Q. Lin**, and D. K. Campbell, Phys. Rev. B **63**, 214402-9 (Jun 2001). **40%; 3.185**
- 117 “Single hole motion in LaMnO<sub>3</sub>”,  
W. G. Yin, **H. Q. Lin**, and C. D. Gong, Phys. Rev. Lett. **87**, 047204 (July 2001)  
and **88**, 139901 (Apr 2002). **40%; 7.489**
- 118 “Quantum Monte Carlo Study of Spin, Charge, and Pairing Correlations in the t-t'-U Hubbard model”,  
Z. B. Huang, **H. Q. Lin**, and J. E. Gubernatis, Phys. Rev. B **64**, 205101 (Nov 2001). **PhD; 3.185**
- 119 “Hole spectral functions of LaMnO”,  
W. G. Yin, **H. Q. Lin\***, and C. D. Gong,  
Physica **C364-365**, 120-122 (Nov 2001). (**invited talk**) **25%; 0.948**
- 120 “Quantum Monte Carlo study of pairing correlations in two-dimensional  
extended one-band and three-band Hubbard models”,  
J. E. Gubernatis, M. Guerrero, **H. Q. Lin**, and Z. B. Huang,  
Physica **C364-365**, 134-137 (Nov 2001). (**invited talk**) **25%; 0.948**
- 121 “Anisotropy of the superconducting transition temperature under uniaxial pressure”,  
X. J. Chen, **H. Q. Lin**, W. G. Yin, C. D. Gong, and H.-U. Habermeier,  
Phys. Rev. B **64**, 212501 (Dec 2001). **25%; 3.185**
- 122 “Exact diagonalization and quantum Monte Carlo study of  
the spin-1/2 XXZ model on the square lattice”,  
**H. Q. Lin**, J.S. Flynn, and D.D. Betts, Phys. Rev. B **64**, 214411 (Dec 2001).  
**corresponding author; 3.185**
- 123 “Dimerized spin fluid in a one-dimensional electron system”,  
Y. Z. Zhang, C. Q. Wu, and **H. Q. Lin**, Phys. Rev. B **65**, 115101 (Mar , 2002). **25%, 3.185**
- 124 “Electronic structure of MgCNi<sub>3-x</sub>(Co/Cu)<sub>x</sub> superconductor”,  
J. L. Wang, Y. Xu, Z. Zeng, Q. Q. Zheng, and **H. Q. Lin**,  
J. Appl. Phys. **91**, 8504-8506 (May 2002). **10%; 2.498**
- 125 “The electronic structure study of Nd<sub>0.5</sub>Ca<sub>0.5</sub>MnO<sub>3</sub> with a charge-exchange type  
antiferromagnetic ordering”,  
W. Y. Hu, Q. Q. Zheng, **H. Q. Lin**, and W. M. Lau,  
J. Appl. Phys. **91**, 8858-8860 (May 2002). **15%; 2.498**
- 126 “Computational Many-Body Physics and Parallel Computation in Hong Kong”,  
**H. Q. Lin**, Proceedings of The Third Joint Meeting of Chinese Physicists Worldwide, p151-153,  
(World Scientific, 2001). (**invited talk**) **100%; Not SCI**
- 127 “Pressure Effect on Critical Temperature of Hole-Doped Cuprate Superconductors”,  
C. D. Gong, X. J. Chen, and **H. Q. Lin**, Proceedings of The Third Joint Meeting of Chinese Physicists  
Worldwide, p140-142, (World Scientific, 2002). (**invited talk**) **33%; Not SCI**
- 128 “Bond order wave and energy gap in a one-dimensional bond-charge attraction model”,  
Y. Z. Zhang, C. Q. Wu, and **H. Q. Lin**, Phys. Rev. B **66**, 035115 (July 15, 2002). **25; 3.185**



- 129 “Exactly soluble quantum spin models on a double layer: The net spin model”,  
**H. Q. Lin**, J. L. Shen, and H. Y. Shik, Phys. Rev. B **66**, 184402 (Nov 1, 2002). **50%; 3.185**
- 130 “Bifurcation of Ground States and Ferrimagnetic Long-range Orders in Anisotropic Mixed-spin Systems”,  
 G. S. Tian and **H. Q. Lin**, Phys. Rev. B **66**, 224408 (Dec 1, 2002). **33%; 3.185**
- 131 “Coexistence of superconductivity and ferromagnetism in ferromagnet/superconductor proximity structure”,  
 G.Y. Sun, D.Y. Xing, R. Shen, and **H. Q. Lin**, Euro. Phys. J. B **30**, 33-38 (Nov 19, 2002). **10%; 1.720**
- 132 “Comments on “Superconductivity in the Two-Dimensional  $t - J$  Model””,  
 T. K. Lee, C. T. Shih, Y. C. Chen, and **H. Q. Lin**, Phys. Rev. Lett. **89**, 279702 (Dec 30, 2002). **25%; 7.489**
- 133 “The Néel Order in a Spatially Anisotropic Heisenberg Antiferromagnet”,  
 Y. Q. Wang, G. S. Tian, and **H. Q. Lin**, Phys. Rev. B **67**, 064408 (Feb 1, 2003). **33%; 3.185**
- 134 “Dynamics phase diagram in a driven vortex lattice with random pinning and thermal fluctuations”,  
 M. Liu, X.D. Liu, D.Y. Xing, and **H. Q. Lin**, Phys. Lett. A **308**, 149-156 (Feb 24, 2003). **10%; 1.550**
- 135 “Exact Diagonalization of the  $S=1/2$  XY Ferromagnet on a New Set of Finite Triangular Lattices at  $T=0$ ”,  
 D. D. Betts, K. S. Lee, and **H. Q. Lin**, Can. J. Phys. **81**, 555-571 (Mar 15, 2003). **33%; 0.581**
- 136 “Bond order wave and energy gap in a 1D SSH-Hubbard model of conjugated polymers”,  
 Y. Z. Zhang, **H. Q. Lin**, and C. Q. Wu, Synthetic Metals **135**, 449-450 (Apr 4, 2003). **33%; 1.320**
- 137 “DMRG study of a 1D ionic SSH-Hubbard model for Charge-transfer salt”,  
 Y. Z. Zhang, C. Q. Wu, and **H. Q. Lin**, Synthetic Metals **135**, 703-704 (Apr 4, 2003). **25%; 1.320**
- 138 “Electronic structure of heavy fermion superconductor  $CeMIn_5$  ( $M=C0,Rh,Ir$ )”,  
 J. L. Wang, Z. Zeng, Q. Q. Zheng, and **H. Q. Lin**, J. Appl. Phys. **93**, 6891-6893 (May 15, 2003). **15%; 2.498**
- 139 “Inducement of bond order wave due to electron correlation in one dimension”,  
 Y. Z. Zhang, C. Q. Wu, and **H. Q. Lin**, Phys. Rev. B **67**, 205109-4 (May 28, 2003). **33%; 3.185**
- 140 “Excited-state level crossing and quantum phase transition in one-dimensional correlated fermion models”,  
 G. S. Tian and **H. Q. Lin**, Phys. Rev. B **67**, 245105-4 (Jun 13, 2003). **50%; 3.185**
- 141 “Exact solution of XXZ chain with unparallel boundary fields”,  
 Jun-peng Cao, **H. Q. Lin**, Kang-jie Shi, and Yupeng Wang,  
 Nuclear Physics B **663**, 487-519 (July 28 2003). **15%; 5.522**
- 142 “Quarter-filled Extended Hubbard Model at Strong Coupling”,  
 W. F. Lee and H. Q. Lin, Int. J. Mod. Phys. B **17**, 3339-3342 (Aug 10, 2003). **PhD; 0.381**
- 143 “Spectral functions of the Falicov-Kimball model with electronic ferroelectricity”,  
 W. G. Yin, W. N. Mei, C-G Duan, **H. Q. Lin**, and J. R. Hardy,  
 Phys. Rev. B **68**, 075111 (Aug 19 2003). **10%; 3.185**
- 144 “Constructing Soluble Quantum Spin Models”,  
 H. Y. Shik, Y. Q. Li, and **H. Q. Lin**, Nuclear Physics B **666**, 337-360 (Sep 1 2003). **MPhil; 5.522**

- 145 “Entanglement, quantum phase transition, and scaling in the XXZ model”,  
S. J. Gu, **H. Q. Lin**, and Y. Q. Li, Phys. Rev. A , **68**, 042330-4 (Oct 24, 2003). **33%; 2.997**
- 146 “Phase diagram and quantum critical behavior of an integrable Kondo lattice model”,  
Yupeng Wang and **H. Q. Lin**, Phys. Rev. B **69**, 092402-4 (Mar 15, 2004). **25%; 3.185**
- 147 “Variation of the Superconducting Transition Temperature of Hole-Doped Copper Oxides”,  
X. J. Chen and **H. Q. Lin**, Phys. Rev. B **69**, 104518 (Mar 23, 2004). **33%; 3.185**
- 148 “Intermediate Coupling Theory of Electronic Ferroelectricity”,  
C. D. Batista, J. E. Gubernatis, J. Bonca, and **H. Q. Lin**,  
Phys. Rev. Lett. **92**, 187601 (May 6, 2004). **20%; 7.489**
- 149 “Quantum Phase Transition in Double Triangular Layer”,  
H. Y. Shik, W. Y. Chen, and **H. Q. Lin**,  
J. Mag. Mat. Mag. **272-276**, 203-204, (May 2004). **MPhil; 0.985**
- 150 “Effect of f-band dispersion on the magnetic properties of periodic Anderson lattice model”,  
H. Y. Shik, Y. Q. Wang, J. E. Gubernatis, and **H. Q. Lin**,  
J. Appl. Phys. **95**, 7195-7197 (Jun 1 2004). **MPhil; 2.498**
- 151 “Entanglement and quantum phase transition in the extended Hubbard model”,  
S. J. Gu, S. S. Deng, Y. Q. Li, and **H. Q. Lin**,  
Phys. Rev. Lett. **93**, 086402 (Aug 20, 2004). **corresponding author; 7.489**
- 152 “The Phase Transition and and Ferrimagnetic Long-range Order in  
the Mixed-spin Heisenberg Model with Anisotropic Single-ion Interaction”,  
G. S. Tian and **H. Q. Lin**, Phys. Rev. B **70**, 104412-7 (Sep 21, 2004). **33%; 3.185**
- 153 “Charge Ordering due to the Antiferromagnetic Correlation in the Quarter-Filled Manganites”,  
H. L. Wang, G. S. Tian, and **H. Q. Lin**, Commun. Theor. Phys. **42**, 475-480 (Sep 15, 2004). **25%;  
0.872**
- 154 “Investigating magnetic Properties by Quantum Monte Carlo Simulations”,  
**H. Q. Lin**, H. Y. Shik, Y. Q. Wang, C. D. Batista, and J. E. Gubernatis,  
J. Mag. Mat. Mag. **281**, 240-246 (Oct , 2004). **Invited; 0.985**
- 155 “Entanglement of the Heisenberg chain with the next-nearest-neighbor interaction”,  
Shi-Jian Gu, Hai-Bing Li, You-Quan Li, and **H. Q. Lin**, Phys. Rev. A **70**, 052302-5 (Nov 1, 2004).  
**25%; 2.997**
- 156 “Ground state and excitations of a four-component fermion model SU(4)”,  
Y. Q. Li, G. S. Tian, M. Ma, and **H. Q. Lin**, Phys. Rev. B **70**, 233105-4 (Dec 20, 2004). **50%;  
3.185**
- 157 “Effect of Lattice Distortion on the Charge Order in Manganites at Doping  $x = 0.5$ ”,  
H. L. Wang, G. S. Tian, and **H. Q. Lin**, Commun. Theor. Phys. **43**, 179-186 (Jan 15, 2005). **25%;  
0.872**
- 158 “Two-Dimensional Quarter-Filled Extended Hubbard Model at Strong Coupling”,  
W. F. Lee and **H. Q. Lin**, Int. J. Mod. Phys. B **19**, 213-216 (Jan 30, 2005). **PhD; 0.381**
- 159 “Phase Separation in the Two-Dimensional Hubbard Model”,  
M. Yu and **H. Q. Lin**, Int. J. Mod. Phys. B **19**, 299-302 (Jan 30, 2005). **MPhil; 0.381**
- 160 “Electronically driven ferroelectricity in the extended Falicov-Kimball model”,  
J. Bonca, C. D. Batista, J. E. Gubernatis, and **H. Q. Lin**, Int. J. Mod. Phys. B **19**, 525-527 (Jan 30,  
2005). **25%; 0.381**

- 161 “Spectral function of the one-dimensional Holstein model at half filling”,  
H. Zhao, C. Q. Wu, and **H. Q. Lin**, Phys. Rev. B **71**, 115201-5 (Mar 07, 2005). **25%; 3.185**
- 162 “Ground-state entanglement in the XXZ model”,  
S. J. Gu, G. S. Tian, and **H. Q. Lin**, Phys. Rev. A **71**, 052322 (May 17, 2005).  
**corresponding author; 2.997**
- 163 “Local electronic structure of a single magnetic impurity in superconducting  $\text{Na}_x\text{CoO}_2 \cdot y\text{H}_2\text{O}$ ”,  
J. An, C. D. Gong, and **H. Q. Lin**, Phys. Rev. B **72**, 014527 (July 15, 2005). **33%; 3.185**
- 164 “Neel order in a spatially anisotropic Heisenberg antiferromagnet with single-ion anisotropy”,  
Y. Q. Wang, G. S. Tian, and **H. Q. Lin**, Phys. Rev. B **72**, 024439 (July 19, 2005). **PhD; 3.185**
- 165 “Physical origin of the ferromagnetic ordering above room temperature in GaMnN nanowires”,  
Y. P. Song, P. W. Wang, **H. Q. Lin**, G. S. Tian, J. Lu, Z. Wang, Y. Zhang, and D. P. Yu,  
J. Phys.: Condens. Matter **17**, 5073-5085 (Aug 5 2005). **5%; 2.145 10329403 China**
- 166 “Study of the Ionic Peierls-Hubbard model using density matrix renormalization group methods”,  
Y. Z. Zhang, C. Q. Wu, and **H. Q. Lin**, Phys. Rev. B , **72**, 125126 (Sep 28, 2005). **25%; 3.185**
- 167 “Generalized Susceptibility and Superconductivity in  $\text{CeMIn}_5$  (M=Co,Rh,Ir) and  $\text{PuCoGa}_5$ ”,  
J. L. Wang, Z. Zeng, and **H. Q. Lin**, J. Appl. Phys. **99**, 08M505 (Apr 15, 2006). **25%; 2.498**
- 168 “Phonon Effects on Spin-Charge Separation in One Dimension”,  
W. Q. Ning, H. Zhao, C. Q. Wu, and **H. Q. Lin**, Phys. Rev. Lett. **96**, 156402 (Apr 21, 2006). **25%; 7.489**
- 169 “Local Entanglement and quantum phase transition in spin models”,  
S. J. Gu, G. S. Tian, and **H. Q. Lin**, New J. Phys. **8**, 61 (Apr 27, 2006). **33%; 3.585**
- 170 “Coexistence of f-wave superconductivity, charge order, and spin antiferromagnetism around nonmagnetic impurities in  $\text{Na}_{0.33}\text{CoO}_2 \cdot 1.3\text{H}_2\text{O}$ ”,  
J. An, **H. Q. Lin**, and C. D. Gong, Phys. Rev. Lett. **96**, 227001 (Jun 9, 2006). **33%; 7.489**
- 171 “Block-block entanglement and quantum phase transitions in one-dimensional extended Hubbard model”,  
S. S. Deng, S. J. Gu, and **H. Q. Lin**, Phys. Rev. B **74**, 045103 (Jul 06, 2006). **MPhil; 3.185**
- 172 “Zero temperature numerical studies of multiband lattice models of strongly correlated electrons”,  
Y. Q. Wang, **H. Q. Lin**, and J. E. Gubernatis, *Review Article in*  
Commun. Comput. Phys. **1**, 576-615 (Aug 2006). **corresponding author**
- 173 “Quantum Entanglement in the S=1/2 Spin Ladder with Ring Exchange”,  
J. L. Song, S. J. Gu, and **H. Q. Lin**, Phys. Rev. B **74**, 155119 (Oct 23, 2006). **MPhil; 3.185**
- 174 “Exact ground state and elementary excitations of the spin tetrahedron chain”,  
S. Chen, Y. P. Wang, W. Q. Ning, C. J. Wu, and **H. Q. Lin**,  
Phys. Rev. B **74**, 174424 (Nov 21, 2006). **20%; 3.185**
- 175 “Entanglement evolution and distillation under a local magnetic pulse”,  
S. J. Gu and **H. Q. Lin**, Phys. Lett. A **361**, 39-42 (Jan 22, 2007). **30%; 1.550**
- 176 “Unified picture of the oxygen isotope effect in cuprate superconductors”,  
Xiao-Jia Chen, Viktor V. Struzhkin, Zhigang Wu, **H. Q. Lin**, Russell J. Hemley, and Ho-kwang Mao,  
*Proceedings of the National Academy of Sciences of the United States of America*, **104** 3732-3735 (Mar 06 2007) **20%; 10.231 RGC ?**

- 177 “Phonon-mediated superconducting transition in layered cuprate superconductors”,  
Xiao-Jia Chen, Viktor V. Struzhkin, Zhigang Wu, Russell J. Hemley, Ho-kwang Mao, and **H. Q. Lin**,  
Phys. Rev. B **75**, 134504-11 (Apr 6, 2007). **20%; 3.185** **HKU3-05C**
- 178 “First-principles investigations of Co- and Fe- doped SnO<sub>2</sub>”,  
X.L. Wang, Z. Zeng, X. H. Zheng, and **H. Q. Lin**, J. Appl. Phys. **101**, 09H104 (May 1, 2007). **5%;**  
**2.498** **10329403 China**
- 179 “Induced effects by the substitution of Mg in MgCNi<sub>3</sub>”,  
Guohua Zhong, Jianglong Wang, Zhi Zeng, Xiaohong Zheng, and **H. Q. Lin**, J. Appl. Phys. **101**,  
09G520 (May 1, 2007). **5%; 2.498** **10329403 China**
- 180 “Existence of long-range orbital order in a two-dimensional orbital-only model”,  
W. L. You, G. S. Tian, and **H. Q. Lin**, Phys. Rev. B **75**, 195118-10 (May 17, 2007). **PhD; 3.185**  
**10329403, RGC 401806, HKU3-05C**
- 181 “Retardation effect on spin-charge separation in one dimension”,  
W. Q. Ning, H. Zhao, C. Q. Wu, and **H. Q. Lin**, Physica C**460-462**, 1127-28 (Sep 01, 2007). **HKU**
- 182 “Ground state of a mixture of two species of fermionic atoms in a one-dimensional optical lattice”,  
S. J. Gu, R. Fan, and **H. Q. Lin**, Phys. Rev. B **76**, 125107-9 (Sep 14, 2007). **401504 and Fudan**
- 183 “Numerical Integration using Wang-Landau Sampling”,  
Y. W. Li, T. Wust, D. P. Landau, and **H. Q. Lin**, Comput. Phys. Commun. **177**, 524-529 (Sep 15,  
2007). **RGC 402205**
- 184 “Pairwise Entanglement and Quantum Phase Transition in Spin Systems”,  
S. J. Gu, G. S. Tian, and **H. Q. Lin**, Chin. Phys. Lett. **24**, 2737-40 (Oct , 2007). **N\_CUHK204/05**
- 185 “Oxygen isotope effect in Bi<sub>2</sub>Sr<sub>2</sub>Ca<sub>n-1</sub>Cu<sub>n</sub>O<sub>2n+4+δ</sub> (n=1,2,3) single crystals”,  
X. J. Chen, B. Liang, C. Ulrich, C. T. Lin, V. V. Struzhkin, Z. G. Wu, R. J. Hemley, H. K. Mao, and  
**H. Q. Lin**, Phys. Rev. B **76**, 140502-4 (Rapid Communication) (Oct , 2007). **HKU.**
- 186 “Correlation entropy and the Kosterlitz-Thouless transition”,  
X. L. Cui, S. J. Gu, J. P. Cao, Y. P. Wang, and **H. Q. Lin**, J. Phys. A **40**, 13523-33 (Nov 09, 2007).  
**N\_CUHK204/05, HKU, Gu**
- 187 “Growth of gold bipyramids with improved yield and their curvature-directed oxidation”,  
Xiaoshan Kou, Weihai Ni, Chia-Kung Tsung, Kong Chan, **H. Q. Lin**, Galen D. Stucky, and Jianfang  
Wang, SMALL **3**, 2103-2113 (Dec 2007). **IF=8.349 (2011).**
- 188 “Universal role of correlation entropy in critical phenomena”,  
S. J. Gu, C. P. Sun, and **H. Q. Lin**, J. Phys. A **41**, 025002-19 (Jan 18, 2008). **N\_CUHK204/05**
- 189 “Fermi surface evolution and pseudogap symmetry in the n-type cuprate superconductors”,  
Y. Zhou, **H. Q. Lin**, and C. D. Gong, Phys. Rev. B **77**, 092510 (Mar 27, 2008). **RGC 402205**
- 190 “Numerical study of ferromagnetic fluctuation and pairing correlation in the single-band Hubbard  
model on triangular lattice”,  
S. Q. Su, Z. B. Huang, R. Fan, and **H. Q. Lin**, Phys. Rev. B **77**, 125114-7 (Mar 15, 2008). **RGC**  
**401806**
- 191 “Monte Carlo studies of magnetism and superconductivity on the triangular lattice”,  
S. Q. Su, Z. B. Huang, and **H. Q. Lin**, J. Appl. Phys. **103**, 07C717 (Apr 01, 2008). **RGC 401806**
- 192 “Critical behaviors of mutual information in the one-dimensional spin-1 bilinear biquadratic model”,  
J. P. Cao, S. J. Gu, Y. P. Wang, and **H. Q. Lin**, J. Phys. A **41**, 205303 (May 23, 2008). **N\_CUHK204/05,**  
**HKU, Gu**

- 193 “Universal behaviors of mutual information in one-dimensional  $J_1 - J_2$  model”,  
J. P. Cao, S. J. Gu, Y. P. Wang, and **H. Q. Lin**, European Physical Journal B **63**, 147-151 (May , 2008). **N\_CUHK204/05, HKU, Gu**
- 194 “Concurrence and fidelity of a Bose-Fermi mixture in a one-dimensional optical lattice”,  
W. Q. Ning, S. J. Gu, Y. G. Chen, C. Q. Wu, and **H. Q. Lin**, J. Phys.: Condens. Matter **20**, 235236 (Jun 11, 2008). **RGC 402107**
- 195 “Fidelity susceptibility, scaling, and universality in quantum critical phenomena”,  
S. J. Gu, H. M. Kwok, W. Q. Ning, and **H. Q. Lin**, Phys. Rev. B **77**, 245109-5 (Jun , 2008). **N\_CUHK204/05**
- 196 “Fidelity susceptibility and long-range correlation in the Kitaev honeycomb model”,  
Shuo Yang, Shi-Jian Gu, Chang-Pu Sun, and **H. Q. Lin**, Phys. Rev. A **78**, 012304-6 (Jul 02, 2008).
- 197 “Superconducting Behavior in Compressed Solid  $\text{SiH}_4$  with a Layered Structure”,  
Xiao-Jia Chen, Jiang-Long Wang, Viktor V. Struzhkin, Ho-kwang Mao, Russell J. Hemley, and **H. Q. Lin**, Phys. Rev. Lett. **101**, 077002 (Aug 15, 2008). **RGC 402205.**
- 198 “Quantum criticality of the Lipkin-Meshkov-Glick model in terms of fidelity susceptibility”,  
H. M. Kwok, W. Q. Ning, S. J. Gu, and **H. Q. Lin**, Phys. Rev. E **78**, 032103-4 (Sep 18, 2008). **RGC 401504, Gu.**
- 199 “Persistent currents in the one-dimensional mesoscopic Hubbard ring”,  
Bo-Bo Wei, S. J. Gu, and **H. Q. Lin**, J. Phys.: Condens. Matter **20**, 395209-8 (Oct 01, 2008). **RGC 402107.**
- 200 “Band effects on the conductivity for a two-band Hubbard model”,  
S. J. Gu, J. Cao, S. Chen, Y. Liu, and **H. Q. Lin**, Euro. Phys. J. B **66**, 477-481 (Dec , 2008). **HKU.**
- 201 “Constraints on the possible pairing symmetry of iron arsenide superconductors in a two-orbital model”,  
Y. L. You, S. J. Gu, G. S. Tian, and **H. Q. Lin**, Phys. Rev. B **79**, 014508 (Jan , 2009). **RGC 402205, HKU.**
- 202 “Effects of hydrogen impurities on  $\text{MnxSi}_{1-x}$  semiconductors”,  
X. L. Wang, M. Y. Ni, Z. Zeng and **H. Q. Lin**, J. Appl. Phys. **105**, 07C512 (Apr 01, 2009).
- 203 “Magnetic and electronic properties of  $\alpha\text{-NaMnO}_2$ ”,  
G. R. Zhang, L. J. Zou, Z. Zeng and **H. Q. Lin**, J. Appl. Phys. **105**, 07E512 (Apr 01, 2009).
- 204 “Competition of magnetism and superconductivity in FeAs-based materials”,  
S. Yang, W. L. You, S. J. Gu, and **H. Q. Lin**, Chinese Physics B **18**, 2545-2550 (Jun , 2009). **RGC 402205, HKU.**
- 205 “Ground-state properties of a Tonks-Girardeau gas in a periodic potential”,  
B. B. Wei, S. J. Gu, and **H. Q. Lin**, Phys. Rev. A **79**, 063627-8 (Jun 24, 2009). **RGC 402107**
- 206 “Orbitally relieved magnetic frustration in  $\text{NaVO}_2$ ”,  
Ting Jia, Guoren Zhang, Zhi Zeng, and **H. Q. Lin**, Phys. Rev. B **80**, 045103-6 (Jul 06, 2009). **CUHK Direct 2060345, NSFC**
- 207 “Scaling dimension of fidelity susceptibility in quantum phase transition”,  
S. J. Gu and **H. Q. Lin**, Euro. Phys. Lett. **87**, 10003-5 (Jul 17, 2009). **Gu**
- 208 “Magnetic properties of bilayer triangular lattice”,  
F. M. Hu, S. Q. Su, T. X. Ma, and **H. Q. Lin**, Phys. Rev. B **80**, 014428-8 (Jul 27, 2009). **RGC 401806**

- 209 “Effects of hydrogen impurities on  $\text{Ge}_{1-x}\text{Mn}_x$ ”,  
X. L. Wang, M. Y. Ni, Z. Zeng, and **H. Q. Lin**, Euro. Phys. Lett. **87**, 47001-5 (Aug 31, 2009).  
**CUHK Direct 2060345, NSFC**
- 210 “Plasmon Coupling in Clusters Composed of Two-Dimensionally Ordered Gold Nanocubes”,  
Huanjun Chen, Zhenhua Sun, Weihai Ni, Kat Choi Woo, Hai-Qing Lin, Lingdong Sun, Jianfang Wang,  
and Chunhua Yan, SMALL **5**, 2111-9 (Sep 18, 2009). **CUHK 3110023**
- 211 “Investigation of pressure effects on  $\text{Mn}_x\text{Ge}_{1-x}$ ”,  
X. L. Wang, M. Y. Ni, Z. Zeng, and **H. Q. Lin**, J. Mag. Mat. Mag. **321**, 2575-2577 (Sep , 2009).  
**CUHK Direct 2060345, NSFC**
- 212 “Evolution of pairing from weak to strong coupling on a honeycomb lattice”,  
Shi-Quan Su, Ka-Ming Tam, and **H. Q. Lin**, Phys. Rev. B **80**, 104517-4 (Sep 29, 2009). **RGC**  
**401806**
- 213 “Shape-Dependent Refractive Index Sensitivities of Gold Nanocrystals with the Same Plasmon Reso-  
nance Wavelength”,  
Huanjun Chen, Lei Shao, Kat Choi Woo, Tian Ming, **H. Q. Lin**, and Jianfang Wang, J. Phys. Chem.  
C **113**, 17691-7 (Oct 15, 2009). **Wang JF**
- 214 “Exact solutions of a one-dimensional mixture of spinor bosons and spinor fermions”,  
S. J. Gu, J. P. Cao, S. Chen, and **H. Q. Lin**, Nuclear Physics B **820**, 753-779 (Oct 21, 2009). **RGC**  
**402107**
- 215 “Quantum phase transition and elementary excitations of a Bose-Fermi mixture in a one-dimensional  
optical lattice”,  
S. J. Gu, J. P. Cao, S. Chen, and **H. Q. Lin**, Phys. Rev. B **88**, 224508 (Dec 14, 2009). **RGC**  
**402107 and 401108**
- 216 “Transparency induced by coupled resonances in disordered metamaterials”,  
W. Tan, Y. Sun, Z. G. Wang, H. Chen\*, and **H. Q. Lin\***, Optical Express **17**, 24317 (Dec 21 2009).
- 217 “Superconductivity in on-atomic-layer metal films grown on Si(111)”,  
T Zhang, P Cheng, W. J. Li, Y. J. Sun, G. Wang, X. G. Zhu, K. He, L. L. Wang, X. C. Ma, X. Chen,  
Y. Y. Wang, Y. Liu, **H. Q. Lin**, J. F. Jia, and Q. K. Xue, Nature Physics **6**, 39 (Feb 2010).
- 218 “Structural, electronic, and electrochemical properties of cathode materials  $\text{Li}_2\text{MSiO}_4$  ( $M = \text{Mn, Fe,}$   
and  $\text{Co}$ ): Density functional calculations”,  
Guohua Zhong, Yanling Li, Peng Yan, Zhuang Liu, Mao-Hai Xie, and **H. Q. Lin**, Journal of Physical  
Chemistry **114**, 3693 (Mar 04, 2010). **N\_HKU 705/07**
- 219 “Electrically controllable RKKY interaction in semiconductor quantum wires”,  
J. J. Zhu, K. Chang, R. B. Liu, and **H. Q. Lin**, Phys. Rev. B **81**, 113302 (Mar 10, 2010).
- 220 “4d electronic and magnetic characteristics in post-perovskite  $\text{CaRuO}_3$ ”,  
G. H. Zhong, Y. L. Li, Z. Liu, and **H. Q. Lin**, J. Appl. Phys. **107**, 09E102 (May 01, 2010). **RGC**  
**402108**
- 221 “Intra-chain antiferromagnetic interaction and Mott state induced by spin-orbit coupling in  $\text{Sr}_3\text{NiIrO}_6$ ”,  
G. R. Zhang, X. L. Zhang, T. Jia, Z. Zeng, and **H. Q. Lin**, J. Appl. Phys. **107**, 09E120 (May 01,  
2010). **N\_HKU 705/07**
- 222 “Angle- and Energy-Resolved Plasmon Coupling in Gold Nanorod Dimers”,  
L. Shao, K. C. Woo, H. J. Chen, Z. Jin, J. F. Wang\*, and **H. Q. Lin\***, ACS Nano **6**, 3053-3062 (Jun  
03, 2010). **N\_HKU 705/07**

- 223 “Structural transitions of solid germane under pressure”,  
C. Zhang, X.-J. Chen, Y.-L. Li, V. V. Struzhkin, H.-K. Mao, R.-Q. Zhang, and **H. Q. Lin**, Euro. Phys. Lett. **90**, 66006 (Jun 2010). **RGC 402108**
- 224 “Reactive Interface Formation and Co-induced ( $\sqrt{7} \times \sqrt{7}$  Superstructure on a GaN(0001) Pseudo-(1x1) Substrate Surface”,  
H. D. Li, G. H. Zhong, **H. Q. Lin**, and M. H. Xie, Phys. Rev. B, **81**, 233302 (Jun 03, 2010). **N\_HKU 705/07**
- 225 “Structural, Elastic, Electronic and Dynamical Properties of OsB and ReB: Density Functional Calculations”,  
Y. L. Li, Z. Zeng, and **H. Q. Lin**, Chem. Phys. Lett. **492**, 246-250 (Jun 07, 2010). **No**
- 226 “Reduced fidelity in the Kitaev honeycomb model”,  
Z. Wang, T. X. Ma, S. J. Gu, and **H. Q. Lin**, Phys. Rev. A **81**, 062350 (Jun 30, 2010). **HKUST**
- 227 “The Low Energy States and Directional Long-range Order in the Two-dimensional Quantum Compass Model”,  
W. L. You, G. S. Tian, and **H. Q. Lin**, J. Phys. A **43**, 275001 (Jul 09, 2010). **RGC 401806 to 402310**
- 228 “Superconductivity in Hydrogen-rich Materials: GeH<sub>4</sub>”,  
C. Zhang, X. J. Chen, Y. L. Li, V. V. Struzhkin, R. J. Hemley, H. K. Mao, R. Q. Zhang, H. Q. Lin\*, J. Superconductivity and Novel Magnetism **23**, 717-719 (Jul 2010). **RGC 402108**
- 229 “Heterostructure-based optical absorbers”,  
G. Q. Du, H. T. Jiang, Z. S. Wang, Y. P. Yang, Z. L. Wang, **H. Q. Lin**, and H. Chen\*, JOURNAL OF THE OPTICAL SOCIETY OF AMERICA B-OPTICAL PHYSICS **27**, 1757-1762 (Sep, 2010). **HKUST**
- 230 “Two-step evolution of doping dependent antiferromagnetism and charge imbalance in multilayered cuprates”,  
Y. Zhou, **H. Q. Lin**, C. D. Gong, Phys. Lett. A **374**, 4065-4070 (Aug 30, 2010). **RGC 402205 to 402109**
- 231 “Chemical trend of pressure-induced metallization in alkaline earth hydrides”,  
C. Zhang, X. J. Chen, R. Q. Zhang\*, and **H. Q. Lin**, J. Phys. Chem. C **114**, 14614 (Sep 2, 2010). **RGC 402108**
- 232 “Controllability of ferromagnetism in graphene”,  
T. X. Ma\*, F. M. Hu, Z. B. Huang, and **H. Q. Lin**, Appl. Phys. Lett. **97**, 112504 (Sep 13, 2010). **RGC 402310**
- 233 “Bond-located spin density wave phase in the two-dimensional ionic Hubbard model”,  
H. M. Chen, Hui Zhao, **H. Q. Lin**, and C. Q. Wu, New J. Phys. **12**, 093021 (Sep 15, 2010). **RGC 402107**
- 234 “Phase separation of t-J-V model on a triangular lattice: Possible application to heavily doped NaxCoO<sub>2</sub>”,  
W. H. Wang\*, Y. H. Cheng, F. Lu, X. G. Luo, **H. Q. Lin**, and L. J. Zou, Phys. Lett. A **374**, 4718-4723 (Oct 18, 2010) **401806!**
- 235 “Spin states of Co ions in La<sub>1.5</sub>Ca<sub>0.5</sub>CoO<sub>4</sub> from first principles”,  
T. Jia, H. Wu\*, G. R. Zhang, X. L. Zhang, Y. Guo, Z. Zeng\*, and **H. Q. Lin**, Phys. Rev. B **82**, 205107 (Nov 3, 2010). **HKUST**

- 236 “Magnetic correlation in the Hubbard model on a honeycomb lattice”,  
T. X. Ma\*, F. M. Hu, Z. B. Huang, and **H. Q. Lin**, Comp. Phys. Comm. **182**, 74-76 (Jan , 2011).  
**HKUST**
- 237 “Numerical study of geometrical frustration: from square to triangular lattices”,  
F. M. Hu\*, T. X. Ma, and **H. Q. Lin**, Comp. Phys. Comm. **182**, 74-76 (Jan , 2011). **Direct**  
**2060374**
- 238 “Structural, electronic and dynamical properties of methane under high pressure”,  
H. Lin, Y. L. Li, Z. Zeng\*, X. J. Xhen, and **H. Q. Lin**, J. Chem. Phys. **134**, 064515 (Feb 14, 2011).  
**RGC 402108**
- 239 “Strong enhancement of d-wave superconducting state in the three-band Hubbard model coupled to  
an apical oxygen phonon”,  
Z. B. Huang, **H. Q. Lin**, and E. Arrigoni, Phys. Rev. B **83**, 064521 (Feb 28, 2011). **RGC 402109**
- 240 “ $\beta$ -tin  $\rightarrow$  *Imma*  $\rightarrow$  sh Phase Transition of Germanium”,  
X. J. Chen, C. Zhang, Y. Meng, R. Q. Zhang, **H. Q. Lin**, V. V. Struzhkin, and H. K. Mao, Phys.  
Rev. Lett. **106**, 135502 (Apr 01, 2011). **RGC 402108; CSRC.**
- 241 “Jahn-Teller effect and magnetic properties in anisotropic triangular compound  $N_{2x}MnO_2$ ”,  
S. D. Ouyang, D. Y. Liu, L. J. Zou\*, and **H. Q. Lin**, J. Appl. Phys. **109**, 07D716 (Apr 01, 2011).  
**RGC 402109**
- 242 “Magnetic frustration in  $\alpha$ - $NaMnO_2$  and  $CuMnO_2$ ”,  
J. Ting, Guoren Zhang, X. L. Zhang, Y. Guo, Z. Zeng\*, and **H. Q. Lin**, J. Appl. Phys. **109**, 07E102  
(Apr 01, 2011). **Direct 2060374**
- 243 “High-pressure and substitution induced effects in  $SrRuO_3$ : First-principles insights”,  
G. H. Zhong, J. L. Wang, Y. L. Li, Z. Liu, and **H. Q. Lin\***, J. Appl. Phys. **109**, 07E163 (Apr 01,  
2011). **RGC 402108**
- 244 “Ab initio study of the giant ferroelectric distortion and pressure-induced spin-state transition in  
 $BiCoO_3$ ”,  
T. Jia, H. Wu\*, G. R. Zhang, X. L. Zhang, Y. Guo, Z. Zeng\*, and **H. Q. Lin**, Phys. Rev. B **83**,  
174433 (May 23, 2011). **HKUST**
- 245 “Thermal quantum and classical correlations and entanglement in the XY spin model with three-spin  
interaction”,  
Y. C. Li and **H. Q. Lin**, Phys. Rev. A **83**, 052323 (May 24, 2011). **MOST; CSRC**
- 246 “Experimental Evidence of Plasmaphores: Plasmon- Directed Polarized Emission from Gold Nanorod  
Fluorophore Hybrid Nanostructures”,  
Tian Ming, Lei Zhao, Huanjun Chen, Kat Choi Woo, Jianfang Wang,\* and **H. Q. Lin**, Nano Letter  
**11**, 2296 (Jun , 2011). **MOST; CSRC**
- 247 “ $KAgF_3$ : Quasi-one-dimensional magnetism in three-dimensional magnetic ion sublattice”,  
X. L. Zhang, Guoren Zhang, J. Ting, Y. Guo, Z. Zeng\*, and **H. Q. Lin**, Phys. Lett. A **375**, 2456  
(Jun 13, 2011). **Direct 2060374**



**From July 01, 2011 to July 31, 2012**

- 248 “Universal Scaling and Fano Resonance in the Plasmon Coupling between Gold Nanorods”,  
Kat Choi Woo, Lei Shao, Huanjun Chen, Yao Liang, Jianfang Wang\*, and **H. Q. Lin\***, *ACS Nano* **5**,  
5976-86 (Jul , 2011). **MOST; CSRC**
- 249 “Observation of the Fano Resonance in Gold Nanorods Supported on High- Dielectric-Constant Sub-  
strates”,  
Huanjun Chen, Lei Shao, Tian Ming, Kat Choi Woo, Yat Cho Man, Jianfang Wang,\* **H. Q. Lin\***,  
*ACS Nano* **5**, 6754-63 (Aug , 2011). **MOST; CSRC**
- 250 “Magnetic impurities in graphene”,  
F. M. Hu, Tianxing Ma, **H. Q. Lin**, and J. E. Gubernatis, *Phys. Rev. B* **84**, 075414 (Aug 03, 2011).  
**RGC 402310, CAEP; CSRC**
- 251 “Magnetic behavior of Fe(Se,Te) systems: First-principles calculations”,  
H. L. Shi, Z. B. Huang\*, J. S. Tse, and **H. Q. Lin\***, *J. Appl. Phys.* **110**, 043917 (Aug 15, 2011).  
**MOST; CSRC**
- 252 “Ferro-orbital order induced by electron-lattice coupling in orthorhombic iron pnictides”,  
D. Y. Liu, Y. M. Quan, D. M. Chen, L. J. Zou\*, and **H. Q. Lin**, *Phys. Rev. B* **84**, 064435 (Aug 26,  
2011). **RGC 402109**
- 253 “Pairing in graphene: A quantum Monte Carlo study”,  
T. X. Ma, Z. B. Huang\*, F. M. Hu, and **H. Q. Lin\***, *Phys. Rev. B* **84**, 121410(R) (Sep 23, 2011).  
**RGC 402310; CSRC**
- 254 “Pulse control of sudden transition for two qubits in XY spin baths and quantum phase transition”,  
Da-Wei Luo, **H. Q. Lin**, Jing-Bo Xu\*, and Dao-Xin Yao, *Phys. Rev. A* **84**, 062112 (Dec 19, 2011).  
**MOST, CSRC**
- 255 “Manipulating classical waves with an analogue of quantum interference in a V-type atom”,  
W. Tan, C.Z. Yang, H.S. Liu, Z.G. Wang, **H. Q. Lin**, and H. Chen, *Euro. Phys. Lett.* **97**, 24003  
(Jan , 2012). **MOST, CSRC**
- 256 “Repeater-Assisted Zeno Effect in Classical Stochastic Processes”,  
S.J. Gu, L.G. Wang, Z.G. Wang, and **H. Q. Lin**, *Chin. Phys. Lett.* **29**, 010303 (Jan , 2012). **Gu’s  
RGC**
- 257 “Phase transitions and electron-phonon coupling in platinum hydride”,  
Chao Zhang, Xiao-Jia Chen, and **H. Q. Lin**, *J. Phys.: Condens. Matter* **24**, 035701 (Jan 25, 2012).  
**RGC 402108, CSRC**
- 258 “General mechanism for orbital selective phase transitions”,  
Yu-Zhong Zhang\*, Hunpyo Lee, **H. Q. Lin**, Chang-Qin Wu, Harald O. Jeschke, and Roser Valent,  
*Phys. Rev. B* **85**, 035123 (Jan 26, 2012). **CAEP, CSRC**
- 259 “Competition between crystal field splitting and Hund’s rule coupling in two-orbital magnetic metal-  
insulator transitions”,  
Y.M. Quan, L.J. Zou, D.Y. Liu, and **H. Q. Lin**, *Euro. Phys. J. B* **85**, 55 (Feb , 2012). **RGC  
402109**
- 260 “SCALING LAW OF SUPERFLUID-INSULATOR TRANSITION IN THE 1D BOSE-HUBBARD  
MODEL”,  
S.J. Gu, J.P. Cao, S. Chen, and **H. Q. Lin**, *Int. J. Mod. Phys. B* **26**, 1250014 (Feb 10, 2012). **Gu’s  
RGC; CSRC**

- 261 “Scaling of quantum Zeno dynamics in many-body systems”,  
W.C. Yu, L.G. Wang, S.J. Gu, and **H. Q. Lin**, *J. Phys. A* **45**, 075306 (Feb 24, 2012). **HKUST**
- 262 “Influence of electronic correlations on orbital polarizations in the parent and doped iron pnictides”,  
Y.M. Quan, L.J. Zou, D.Y. Liu, and **H. Q. Lin**, *J. Phys.: Condens. Matter* **24**, 085603 (Feb 29, 2012).
- 263 “Structural, Electronic, Dynamical, and Superconducting Properties in Dense GeH<sub>4</sub>(H-2)(2)”,  
G.H. Zhong, C. Zhang, X.J. Chen, Y.L. Li, R.Q. Zhang, and **H. Q. Lin**, *J. Phys. Chem. C* **116**, 5226-5235 (Mar 01, 2012). **RGC 402108; SZ and CSRC**
- 264 “Distinct Plasmonic Manifestation on Gold Nanorods Induced by the Spatial Perturbation of Small Gold Nanospheres”,  
Lei Shao, Caihong Fang, Huanjun Chen, Yat Cho Man, Jianfang Wang\*, and **H. Q. Lin**, *Nano Letters* **12**, 1424-30 (Mar , 2012). **MOST; CSRC**
- 265 “Behavior of a magnetic impurity in graphene in the presence of a vacancy”,  
F.M. Hu, J.E. Gubernatis, **H. Q. Lin**, Y.C. Li, and R.M. Nieminen, *Phys. Rev. B* **85**, 115442 (Mar 28, 2012). **CSRC**
- 266 “Spin-flip effect on transport properties of 2 Mn<sub>3</sub> molecule”,  
H. Hao, X.H. Zheng, R.N. Wang, Z. Zeng, and **H. Q. Lin**, *J. Appl. Phys.* **111**, 07B303 (Apr 01, 2012).
- 267 “The strong quasi-one-dimensional antiferromagnetism in a charge-transfer insulator: AgSO<sub>4</sub>”,  
X. Zhang, J. Jia, T. Liu, Z. Zeng, and **H. Q. Lin**, *J. Appl. Phys.* **111**, 07E136 (Apr 01, 2012). **HKUST**
- 268 “Quantum phase diagram of the frustrated spin ladder with next-nearest-neighbor interactions”,  
Y. C. Li and **H. Q. Lin**, *New J. Phys.* **14**, 063019 (Jun 15, 2012). **MOST; CSRC**
- 269 “Electronic band gaps and transport in aperiodic graphene superlattices of Thue-Morse sequence”,  
T.X. Ma, C. Liang, L.G. Wang, and **H. Q. Lin**, *Appl. Phys. Lett.* **100**, 252402 (Jun 18, 2012). **CSRC**
- 270 “Plasmonic-Molecular Resonance Coupling: Plasmonic Splitting versus Energy Transfer”,  
H.J. Chen, L. Shao, K.C. Woo, J.F. Wang\*, and **H. Q. Lin**, *J. Phys. Chem. C* **116**, 14088-14095 (Jul 05, 2012). **CSRC**
- 271 “ Cooperative effects of two optical dipole antennas coupled to plasmonic Fabry-Perot cavity”,  
Z.J. Yang, Q.Q. Wang\*, and **H. Q. Lin\***, *Nanoscale*, **4**, 5308-11 (Jul , 2012). **MOST; CSRC**

**From Aug 01, 2012 to July 31, 2013**

- 272 “Scaling of the Leading Response in Linear Quench Dynamics in the Quantum Ising Model”,  
W.C. Yu, L.G. Wang, S.J. Gu\*, and **H. Q. Lin**, Chin. Phys. Lett. **29**, 086402 (Aug , 2012). **HKUST**
- 273 “Plasmonic Percolation: Plasmon-Manifested Dielectric-to-Metal Transition”,  
Huanjun Chen, Feng Wang, Kun Li, Kat Choi Woo, Jianfang Wang\*, Quan Li, Ling-Dong Sun, Xixiang Zhang, **H. Q. Lin**, and Chun-Hua Yan, ACS Nano **6**, 7162-71 (Aug , 2012). **CSRC**
- 274 “Dynamics of Correlations and Scaling Behaviors in a Spin-Chain Environment”,  
Y. C. Li\*, **H. Q. Lin**, and J. B. Xu, Euro. Phys. Lett. **100**, 20002 (Oct , 2012). **MOST; CSRC**
- 275 “Ferromagnetic Fluctuation in Doped Armchair Graphene Nanoribbons”,  
T. X. Ma\*, S. H. Liu, P. Gao, Z. B. Huang, and **H. Q. Lin**, J. Appl. Phys. **112**, 073922 (Oct 01, 2012). **MOST; CSRC**
- 276 “Electronic structure and magnetism of La<sub>4</sub>Ni<sub>3</sub>O<sub>8</sub> from first principles”,  
T. Liu, G. R. Zhang, X. L. Zhang, T. Jia, Z. Zeng, and **H. Q. Lin**, J. Phys.: Condens. Matter **24**, 405502 (Oct 10, 2012). **402109; SZ**
- 277 “High-pressure phases of a hydrogen-rich compound: Tetramethylgermane”,  
Z. X. Qin\*, C. Zhang, L. Y. Tang, G. H. Zhong, **H. Q. Lin**, and X. J. Chen, Phys. Rev. B **86**, 184110 (Nov 27, 2012). **SZ; CSRC, SZ**
- 278 “Phonon-mediated superconductivity in quasi-1D Sc<sub>3</sub>CoC<sub>4</sub>”,  
C. Zhang, J. S. Tse\*, K. Tanaka, and **H. Q. Lin**, Euro. Phys. Lett. **100**, 67003 (Dec , 2012). **CSRC;**
- 279 “Magnetic Instability and Pair Binding in Aromatic Hydrocarbon Superconductors”,  
Z. B. Huang\*, C. Zhang, and **H. Q. Lin**, **Scientific Reports** **2**, 922 (Dec 04, 2012). **MOST; CSRC**
- 280 “Scaling Behavior of the Ground-State Fidelity in the Lipkin-Meshkov-Glick Model”,  
C. Y. Leung, W. C. Yu, H. M. Kwok, S. J. Gu\*, and **H. Q. Lin**, Int. J. Mod. Phys. B **26**, 1250170 (Dec 20, 2012). **HKUST, CU**
- 281 “Risks of an epidemic in a two-layered railway-local area travelling network”,  
Z. Y. Ruan, P. M. Hui, **H. Q. Lin**, and Z. H. Liu\*, Euro. Phys. J. B **86**, 13 (Jan , 2013). **CU**
- 282 “Vibrational and structural properties of tetramethyltin under pressure”,  
Z. X. Qin, X. J. Chen, C. Zhang, L. Y. Tang, G. H. Zhong, **H. Q. Lin**, Y. Meng, and H. K. Mao, J. Chem. Phys. **138**, 024307 (Jan 14, 2013). **SZ; CSRC, SZ**
- 283 “Metals on Graphene: Interactions, Growth Morphology, and Thermal Stability”,  
Xiaojie Liu, Cai-Zhuang Wang\*, Myron Hupalo, **H. Q. Lin**, Kai-Ming Ho, and Michael C. Tringides, Crystals (Review) **3**, 79-111 (Jan 31, 2013). **CSRC**
- 284 “Origin of the Pseudogap and Its Influence on Superconducting State”,  
Yuan ZHOU\*, **H. Q. Lin**, and Chang-De GONG, J. Phys. Soc. Jpn. **82**, 034702 (Mar , 2013). **HKUST; CU**
- 285 “Hidden ( $\pi, 0$ ) instability as an itinerant origin of bicollinear antiferromagnetism in Fe<sub>1+x</sub>Te”,  
M. C. Ding, **H. Q. Lin**, and Y. Z. Zhang\*, Phys. Rev. B **87**, 125129 (Mar 19, 2013). **CAEP; CSRC**
- 286 “Quantum Monte Carlo Study of a Dominant s-Wave Pairing Symmetry in Iron-Based Superconductors”,  
Tianxing Ma\*, **H. Q. Lin**, and Jiangping Hu, Phys. Rev. Lett. **110**, 107002 (Mar 05, 2013). **MOST; CSRC**

- 287 “Commensurate magnetic excitations induced by band splitting and Fermi surface topology in n-type cuprates”,  
H. Y. Zhang, Y. Zhou\*, **H. Q. Lin**, and C. D. Gong, *J. Phys.: Condens. Matter* **25**, 155603 (Apr 17, 2013). **HKUST; CU**
- 288 “Indirect exchange of magnetic impurities in zigzag graphene ribbon”,  
J. H. Sun\*, F. M. Hu, H. K. Tang, W. Guo, and **H. Q. Lin**, *J. Appl. Phys.* **113**, 17B515 (May 07, 2013). **HKUST; CU**
- 289 “First-principles investigations on the magnetic property in tripotassium doped picene”,  
Guo-Hua Zhong\*, Chao Zhang, Guang-Fen Wu, Zhong-Bing Huang, Xiao-Jia Chen, and **H. Q. Lin**,  
*J. Appl. Phys.* **113**, 17E131 (May 07, 2013). **SZ; SZ, CSRC**
- 290 “Superconductivity in beta-Tin Germanium”,  
C. Zhang, X. J. Chen, and **H. Q. Lin**, *J. Superconductivity and Novel Magnetism* **26**, 5 (May , 2013).  
**CSRC**
- 291 “Pressure-induced spin-state and insulator-metal transitions in Sr<sub>3</sub>Fe<sub>2</sub>O<sub>5</sub> from first principles”,  
T. Jia, H. Wu\*, X. L. Zhang, T. Liu, Z. Zeng\*, and **H. Q. Lin**, *Euro. Phys. Lett.* **102**, 6 (Jun , 2013). **CU**
- 292 “Pressure-induced superconductivity in CaC<sub>2</sub>”,  
Yan-Ling Lia, Wei Luob, Zhi Zeng, **H. Q. Lin**, Ho-kwang Mao\*, and Rajeev Ahujab\*, *Proceedings of the National Academy of Sciences of the United States of America* **110**, 9289 (Jun 04, 2013). **CSRC**
- 293 “MAGNETIC IMPURITY IN THE VICINITY OF A VACANCY IN BILAYER GRAPHENE”,  
J. H. Sun, F. M. Hu, H. K. Tang, and **H. Q. Lin**, *Int. J. Mod. Phy. B* **27**, (Jun 20, 2013). **HKUST; CU**
- 294 “Quantum Monte Carlo study of magnetic and superconducting properties of graphene”,  
**H. Q. Lin**\*, T. X. Ma, and Z. B. Huang, *Mathematical Methods in the Applied Sciences*, (Jul 19, 2013/Dec , 2015). **RGC; CSRC**

**From Aug 01, 2013 to July 31, 2014**

- 295 “Interlayer magnetic-frustration-driven quantum spin disorder in the honeycomb compound  $\text{In}_3\text{Cu}_2\text{VO}_9$ ”,  
D. Y. Liu, Y. Guo, X. L. Zhang, J. L. Wang, Z. Zeng, **H. Q. Lin**, and L. J. Zou\*, Euro. Phys. Lett.  
**103**, 47010 (Aug , 2013). **CU**
- 296 “Optical properties of impact diamonds from the Popigai astrobleme”,  
A. Yelisseyev\*, G. S. Meng, V. Afanasyev, N. Pokhilenko, V. Pustovarov, A. Isakova, Z. S. Lin\*, and  
**H. Q. Lin**, Diamond and Related Materials **37**, 8-16 (Aug , 2013). **MOST; CSRC**
- 297 “Multiple scattering theory for massive Dirac fermions on the topological insulator surface with a  
strong warping effect”,  
Z. G. Fu, P. Zhang\*, **H. Q. Lin**, and S. S. Li, Phys. Rev. B **88**, 085304 (Aug 05, 2013). **CSRC**
- 298 “ORBITAL SELECTIVE PHASE TRANSITION”,  
YAO YAO and YU-ZHONG ZHANG\*, HUNPYO LEE, HARALD O. JESCHKE and ROSER VA-  
LENT, **H. Q. Lin**, C. Q. Wu, Int. J. Mod. Phys. B **27** (Brief Review), (Aug 10, 2013). **CSRC**
- 299 “A SPIN CHAIN WITH SPIRAL ORDERS: PERSPECTIVES OF QUANTUM INFORMATION  
AND MECHANICAL RESPONSE”,  
S. J. Gu\*, W. C. Yu, and **H. Q. Lin**, Int. J. Mod. Phys. B **27**, (Aug 20, 2013). **RGC; CSRC**
- 300 “Construct order parameters from the reduced density matrix spectra”,  
S. J. Gu\*, W. C. Yu, and **H. Q. Lin**, Annals of Physics **336**, 118-129 (Sep , 2013). **RGC; CSRC**
- 301 “Tunable two types of Fano resonances in metal-dielectric core-shell nanoparticle clusters”,  
Z. J. Yang, Q. Q. Wang\*, and **H. Q. Lin\***, Appl. Phys. Lett. **103**, 111115 (Sep 09, 2013). **MOST**
- 302 “Structural and vibrational properties of phenanthrene under pressure”,  
Huang, Qiao-Wei; Zhang, Jiang; Berlie, Adam; Qin, Zhen-Xing; Zhao, Xiao-Miao; Zhang, Jian-Bo;  
Tang, Ling-Yun; Liu, Jing; Zhang, Chao; Zhong, Guo-Hua; **H. Q. Lin**; Chen, Xiao-Jia\*, J. Chem.  
Phys. **139**, 104302 (Sep 14, 2013). **SZ, CSRC**
- 303 “Wilson Ratio of Fermi Gases in One Dimension”,  
X. W. Guan\*, X. G. Yin, A. Foerster, M. T. Batchelor, C. H. Lee, and **H. Q. Lin\***, Phys. Rev. Lett.  
**111**, 130401 (Sep 23, 2013). **NSFC 9123020**
- 304 “Phase transformations and vibrational properties of coronene under pressure”,  
Zhao, Xiao-Miao; Zhang, Jiang; Berlie, Adam; Qin, Zhen-Xing; Huang, Qiao-Wei; Jiang, Shan; Zhang,  
Jian-Bo; Tang, Ling-Yun; Liu, Jing; Zhang, Chao; Zhong, Guo-Hua; **H. Q. Lin**; Chen, Xiao-Jia\*, J.  
Chem. Phys. **139**, 144308 (Oct 14, 2013). **SZ, CSRC**
- 305 “Electronic band gaps and transport properties in aperiodic bilayer graphene superlattices of Thue-  
Morse sequence”,  
C. G. Li, H. M. Cheng, R. F. Chen, T. X. Ma\*, L. G. Wang\*, Y. Song, and **H. Q. Lin**, Appl. Phys.  
Lett. **103**, 172106 (Oct 21, 2013). **CSRC**
- 306 “Phase diagram of a spin-orbit coupled Fermi gas in a bilayer optical lattice”,  
X. S. Yang\*, B. B. Huang, and **H. Q. Lin**, J. Phys. B: At. Mol. Opt. Phys. **46**, 205302 (Oct 28,  
2013).
- 307 “Formation of Nanof foam carbon and re-emergence of Superconductivity in compressed  $\text{CaC}_6$ ”,  
Y. L. Li\*, W. Luo, X. J. Chen, Z. Zeng, **H. Q. Lin**, and R. Ahuja\*, Scientific Reports **3**, 3331 (Nov  
26, 2013).
- 308 “Van der Waals density functional study of the structural and electronic properties of La-doped phenan-  
threne”,  
X. W. Yan, Z. B. Huang\*, and **H. Q. Lin**, J. Chem. Phys. **139**, 204709 (Nov 28, 2013). **MOST**

- 309 “Design of a structure with low incident and viewing angle dependence inspired by Morpho butterflies”, W. L. Wang, W. Zhang, J. J. Gu, Q. L. Liu, T. Deng, D. Zhang, and **H. Q. Lin**, *Scientific Reports* **3**, 3427 (Dec 05, 2013). **MOST**
- 310 “Low-temperature properties of an integrable spin-3/2 gas with weak external magnetic field”, Y. Z. Jiang, J. P. Cao, and **H. Q. Lin**, *Phys. Rev. A* **88**, 063618 (Dec 10, 2013). **CAEP, NSFC 91230203**
- 311 “Quantum confinement induced oscillatory electric field on a stepped Pb(111) film and its influence on surface reactivity”, X. J. Liu, C. Z. Wang\*, M. Hupalo, **H. Q. Lin\***, K. M. Ho, and M. C. Tringides, *Phys. Rev. B* **89** (*rapid communication*), 041401 (Jan 06, 2014).
- 312 “Plasmonic Fano resonances in metallic nanorod complexes”, Z. J. Yang, Z. H. Hao, **H. Q. Lin\***, and Q. Q. Wang\*, *Nanoscale* **6**, 4985-97 (Feb 2014). **MOST**
- 313 “Nanoantenna-Sandwiched Graphene with Giant Spectral Tuning in the Visible-to-Near-Infrared Region”, L. Shao, X. M. Wang, H. T. Xu, J. F. Wang\*, J. B. Xu\*, L. M. Peng, and **H. Q. Lin**, *Advanced Optical Materials* **2**, 162-170 (Feb 2014). **MOST**
- 314 “Antiferromagnetism and its origin in iron-based superconductors”, M. C. Ding, **H. Q. Lin**, and Y. Z. Zhang, *Low Temperature Physics* **40**, 113-122 (Feb 2014).
- 315 “Spin-spin interaction in the bulk of topological insulators”, J. H. Sun, L. Chen, and **H. Q. Lin**, *Phys. Rev. B* **89**, 115101 (Mar 03, 2014).
- 316 “Pressure-induced planar N-6 rings in potassium azide”, J. Zhang, Z. Zeng\*, **H. Q. Lin**, and Y. L. Li, *Scientific Reports* **4**, 4358 (Mar 15, 2014). **NSAF**
- 317 “Constraint on the potassium content for the superconductivity of potassium-intercalated phenanthrene”, Q. W. Huang, G. H. Zhong, J. Zhang, X. M. Zhao, C. Zhang, **H. Q. Lin**, and X. J. Chen\*, *J. Chem. Phys.* **140**, 114301 (Mar 21, 2014).
- 318 “Dimensionality-induced insulator-metal crossover in layered nickelates  $\text{La}_{n+1}\text{Ni}_n\text{O}_{2n+2}$  ( $n=2,3$ , and  $\infty$ )”, T. Liu, H. Wu\*, T. Jia, X. L. Zhang, Z. Zeng\*, **H. Q. Lin**, X. G. Li, *AIP Advances* **4**, 047132 (Apr 2014). **NSAF**
- 319 “A site-selective antiferromagnetic ground state in layered pnictide-oxide  $\text{BaTi}_2\text{As}_2\text{O}$ ”, X. L. Yu, D. Y. Liu, Y. M. Quan, T. Jia, **H. Q. Lin**, and L. J. Zou\*, *J. Appl. Phys.* **115**, 17A924 (May 07, 2014).
- 320 “Probing the non-locality of Majorana fermions via quantum correlations”, J. Li, T. Yu, **H. Q. Lin**, and J. Q. You\*, *Scientific Reports* **4**, 4930 (May 12, 2014). **MOST, NSAF**
- 321 “High-pressure study of isoviolanthrone by Raman spectroscopy”, X. M. Zhao, et al X. J. Chen\*, *J. Chem. Phys.* **140**, 244314 (Jun 28, 2014). **SZ**
- 322 “Anisotropic Fabry-Perot resonant states confined within nanosteps on the topological insulator surface”, Z. G. Fu, P. Zhang\*, M. Chen, Z. G. Wang, F. W. Zheng, and **H. Q. Lin**, *Scientific Reports* **4**, 5544 (Jul 02, 2014). **NSFC**
- 323 “Polymerization of nitrogen in cesium azide under modest pressure”, X. L. Wang\*, J. F. Li, H. Y. Zhu, L. Chen, and **H. Q. Lin**, *J. Chem. Phys.* **141**, 044717 (Jul 28, 2014). **NSAF**

**From Aug 01, 2014 to July 31, 2015**

- 324 “Berezinskii-Kosterlitz-Thoules phase transition of spin-orbit coupled Fermi gas in optical lattice”,  
H. K. Tang, X. S. Yang\*, J. H. Sun, and **H. Q. Lin\***, Euro. Phys. Lett. **107**, 40003 (Aug 08, 2014).  
**NSFC**
- 325 “Electronic Bloch oscillation in bilayer graphene gradient superlattices”,  
H. M. Cheng, C. G. Li, T. X. Ma\*, L. G. Wang\*, Y. Song, and **H. Q. Lin**, Appl. Phys. Lett. **105**,  
072103 (Aug 18, 2014).
- 326 “Magnetic Moment Enhancement for Mn-7 Cluster on Graphene”,  
X. J. Liu, C. Z. Wang\*, **H. Q. Lin\***, and K. M. Ho, J. Phys. Chem. C **118**, 19123 (Aug 21, 2014).
- 327 “Structures and magnetic properties of Fe clusters on graphene”,  
X. J. Liu, C. Z. Wang\*, **H. Q. Lin\***, and K. M. Ho, Phys. Rev. B **90**, 155444 (Oct 27, 2014).
- 328 “Antiferromagnetism in Potassium-Doped Polycyclic Aromatic Hydrocarbons”,  
G. H. Zhong, Z. B. Huang, and **H. Q. Lin**, IEEE Transaction on Magnetics **50**, 1700103 (Nov , 2014).  
**NSAF**
- 329 “Structural phase transition and metallization in compressed SrC<sub>2</sub>”,  
Y. L. Li, Rajeev Ahuja, and **H. Q. Lin**, Chinese Science Bulletin **59**, 5269 (Dec , 2014).
- 330 “Possible triplet p + ip superconductivity in graphene at low filling”,  
T. X. Ma, F. Yang\*, H. Yao\*, and **H. Q. Lin**, Phys. Rev. B **90**, 245114 (Dec 04, 2014).
- 331 “Photonic simulation of topological superconductor edge state and zero-energy mode at a vortex”,  
W. Tan\*, L. Chen\*, X. Ji, and **H. Q. Lin**, Scientific Reports **4**, 7381 (Dec 09, 2014).**NSFC, MOST**
- 332 “Ba(2)phenanthrene is the main component in the Ba-doped phenanthrene superconductor”,  
X. W. Yan, Z. B. Huang\*, and **H. Q. Lin**, J. Chem. Phys. **141**, 224501 (Dec 14, 2014). **MOST**
- 333 “Charge oscillations and interaction between potassium adatoms on graphene studied by first-principles  
calculations”, X. J. Liu\*, C. Z. Wang\*, **H. Q. Lin**, K. Chang\*, J. Chen, and K. M. Ho, Phys. Rev.  
B **91**, 035415 (Jan 13, 2015).
- 334 “Nagaoka Ferromagnetism in Two-Band Hubbard Model”,  
D. P. Zhang, G. S. Tian, and **H. Q. Lin**, Commun. Theor. Phys. **63**, 261-270 (Feb , 2015).
- 335 “Comparison of the plasmonic performances between lithographically fabricated and chemically grown  
gold nanorods”,  
L. Shao, Y. T. Tao, Q. F. Ruan, J. F. Wang\*, and **H. Q. Lin\***, PCCP **17**, 10861 (Mar , 2015).**C-NSAF**
- 336 “Stabilization of fullerene-like boron cages by transition metal encapsulation”,  
J. Lv, Y. C. Wang, L. J. Zhang, **H. Q. Lin**, J. J. Zhao, and Y. M. Ma, Nanoscale **7**, 10482 (May ,  
2015).
- 337 “Switching plasmon coupling through the formation of dimers from polyaniline-coated gold nanospheres”,  
N. Jiang, Q. F. Quan, F. Qin, J. F. Wang\*, and **H. Q. Lin**, Nanoscale **7**, 12516 (May , 2015).**C-NSAF**
- 338 “Excellent photothermal conversion of core/shell CdSe/ Bi<sub>2</sub>Se<sub>3</sub> quantum dots”,  
G. Z. Jia, W. K. Lou, F. Cheng, X. L. Wang, J. H. Yao, N. Dai, **H. Q. Lin**, and K. Chang\*, Nano  
Research **8**, 1443-1453 (May , 2015). **MOST**
- 339 “Electric and geometric controlling of the magnetic coupling in Kane-Mele nanoribbons”,  
W. C. Bao, L. J. Zou\*, and **H. Q. Lin**, J. Appl. Phys. **117**, 17D905 (May 07, 2015). **NSAF**

- 340 “The magnetic origin of multiferroic  $\text{Y}_2\text{CoMnO}_6$ ”,  
T. Jia, Z. Zeng\*, X. G. Li, and **H. Q. Lin**, J. Appl. Phys. **117**, 17E119 (May 07, 2015). **NSAF**
- 341 “Exotic pairing in 1D spin-3/2 atomic gases with  $\text{SO}(4)$  symmetry”,  
Y. Z. Jiang, X.-W. Guan\*, J. P. Cao, and **H. Q. Lin\***, Nucl. Phys. B **895**, 206-232 (Jun , 2015).  
**NSFC, MOST**



**From Aug 01, 2015 to July 31, 2016**

- 342 “Triplet p + ip pairing correlations in the doped Kane-Mele-Hubbard model: A Monte Carlo Study”,  
T. X. Ma, **H. Q. Lin**, and J. E. Gubernatis, *Euro. Phys. Lett.* **111**, 47003 (Aug , 2015). **C-NSAF;**
- 343 “Mercury under Pressure acts as Transition Metal: Calculated from First Principles”,  
J. Botana, X. L. Wang, C. J. Hou, D. D. Yan, **H. Q. Lin**, Y. Ma, and M. S. Miao\*, *Angewandte Chemie-International Edition* **54**, 9280-83 (Aug 03, 2015). (cover) **NSAF, C-NSAF; CSRC**
- 344 “Higher order solution to non-Markovian quantum dynamics via a hierarchical functional derivative”  
D. W. Luo, C. H. Lam, L. A. Wu, T. Yu, **H. Q. Lin**, and J. Q. You, *Phys. Rev. A* **92**, 022119 (Aug 24, 2015). **C-NSAF; CSRC**
- 345 “Ground-state phase diagram of the quantum Rabi model”,  
Z. J. Ying, M. X. Liu, H. G. Luo, **H. Q. Lin**, and J. Q. You, *Phys. Rev. A* **92**, 053823 (Nov 09, 2015). **C-NSAF; CSRC**
- 346 “Anionic Chemistry of Noble Gases: Formation of Mg-NG (NG = Xe, Kr, Ar) Compounds under Pressure”,  
M. S. Miao\*, X. L. Wang, J. Brgoch, F. Spera, M. G. Jackson, G. Kresse, and **H. Q. Lin**, *Journal of the American Chemical Society* **137**, 14122-14128 (Nov 11, 2015). **NSAF, C-NSAF;**
- 347 “Effects of pressure and distortion on superconductivity in  $Tl_2Ba_2CaCu_2O_{8+\delta}$ ”,  
J. B. Zhang, V. V. Struzhkin, W. G. Yang, H.-K. Mao, **H. Q. Lin**, Y.-C. Ma, N.-L. Wang, and X. J. Chen\*, *J. Phys.: Condens. Matter* **27**, 445701 (Nov 11, 2015). **NSAF;**
- 348 “Pressure-induced superconductivity in H-2-containing hydride  $PbH_4(H-2)_2$ ”,  
Y. Cheng, C. Zhang, T. T. Wang, G. H. Zhong, C. L. Yang, X. J. Chen, and **H. Q. Lin**, *Sci. Rep.* **5**, 3427 (Nov 12, 2015). **NSAF, NSFC; SZ**
- 349 “Interface engineering of electronic properties of graphene/boron nitride lateral heterostructures”,  
D. Zhang, D. B. Zhang\*, F. H. Yang, **H. Q. Lin**, H. Q. Xu, and K. Chang\*, *2D Materials* **2**, 041001 (Dec , 2015).
- 350 “Growth morphology and properties of metals on graphene”,  
X. J. Liu, Y. Han, J. W. Evans, A. K. Engstfeld, R. J. Behm, M. C. Tringides, M. Hupalo, **H. Q. Lin**, L. Huang, K. M. Ho, D. Appy, P. A. Thiel, C. Z. Wang\*, *Progress in Surface Science* **90**, (review) 397-443 (Dec , 2015).
- 351 “Colloidal Moderate-Refractive-Index  $Cu_2O$  Nanospheres as Visible-Region Nanoantennas with Electromagnetic Resonance and Directional Light-Scattering Properties”,  
S. R. Zhang, R. B. Jiang, Y. M. Xie, Q. F. Ruan, B. C. Yang\*, J. F. Wang\*, and **H. Q. Lin\***, *Advanced Materials* **27**, 7432 (Dec 02, 2015). **C-NSAF; CSRC**
- 352 “Electronic band gaps and transport properties in periodically alternating mono- and bi-layer graphene superlattices”,  
X. Fan, W. J. Huang, T. X. Ma\*, L. G. Wang\*, and **H. Q. Lin**, *Euro. Phys. Lett.* **112**, 58003 (Dec 17, 2015).
- 353 “Dynamical invariants in a non-Markovian quantum-state-diffusion equation”,  
D. W. Luo, P. V. Pyshkin, C. H. Lam, T. Yu, **H. Q. Lin**, J. Q. You, and L. A. Wu\*, *Phys. Rev. A* **92**, 062127 (Dec 28, 2015). **C-NSAF; CSRC**
- 354 “The instability of S vacancies in  $Cu_2ZnSnS_4$ ”,  
X. L. Zhang, M. M. Han, Z. Zeng\*, and **H. Q. Lin**, *RSC Advances* **6**, 15424-15429 (Jan 22, 2016). **NSAF;**

- 355 “Pressure-induced ferromagnetic half-metallicity in cobaltocene”,  
X. W. Yan, Z. B. Huang, G. H. Zhong, and **H. Q. Lin**, Euro. Phys. Lett. **113**, 27005 (Jan , 2016).  
**CSRC**;
- 356 “Highly enhanced transverse plasmon resonance and tunable double Fano resonances in gold@titania nanorods”,  
Q. F. Ruan, C. H. Fang, R. B. Jiang, H. L. Jia, Y. H. Lai, J. F. Wang\*, and **H. Q. Lin**, Nanoscale **8**, 6514-6526 (Jan , 2016). ;
- 357 “Thickness control produces gold nanoplates with their plasmon in the visible and near- infrared regions”,  
F. Qin, T. Zhao, R. B. Jiang, N. N. Jiang, Q. F. Ruan, J. F. Wang\*, L. D. Sun\*, C. H. Yan\*, and **H. Q. Lin**, Advanced Optical Materials **4**, 76-85 (Jan , 2016).
- 358 “Gate-induced gap in bilayer graphene suppressed by Coulomb repulsion”,  
J. R. Xu, Z. Y. Song, **H. Q. Lin**, and Y. Z. Zhang\*, Phys. Rev. B **93**, 035109 (Jan 11, 2016).
- 359 “Metal intercalation-induced selective adatom mass transport on graphene”,  
X. J. Liu, C. Z. Wang\*, Myron Hupalo, **H. Q. Lin**, K. M. Ho, P. A. Thiel, and M. C. Tringides, Nano Research **9**, 1434-1441 (May , 2016). **C-NSAF**;
- 360 “alpha-K2AgF4: Ferromagnetism induced by the weak superexchange of different e(g) orbitals from the nearest neighbor Ag ions”,  
Xiaoli Zhang, Guoren Zhang, J. Ting, Z. Zeng\*, and **H. Q. Lin**, AIP Advances **6**, 055702 (May , 2016). **NSAF**;
- 361 “Combined experimental and computational study of high-pressure behavior of triphenylene”,  
X. M. Zhao, G. H. Zhong, J. Zhang, Q. W. Huang, A. F. Goncharov, **H. Q. Lin**, and X. J. Chen\*, Sci. Rep. **6**, 25600 (May 10, 2016).
- 362 “Quantum coherence and quantum phase transitions”,  
Y. C. Li\* and **H. Q. Lin**, Sci. Rep. **6**, 26365 (May 19, 2016). **909**
- 363 “Boosting computational capabilities”,  
**H. Q. Lin**, Nature Materials **15**, 693-694 (Jul , 2016). **C-NSAF**