.

Curriculum Vitae

Dr. WeiDong Li

Institute of Theoretical Physics

Department of Physics
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March 22, 2019

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Home address:	
Work address:	Institute of Theoretical Physics, Shanxi University 030006, TaiYuan, Shanxi, China phone: +86-351-7011081 (Office) fax: +86-351-7011233 e-mail:
Citizenship:	Chinese
Civil Status:	
Knowledge of foreign languages:	English
1990, July:	B. S. degree Shanxi University, P. R. of China
1990-1994:	Secretary (Office of Science and Technology, Shanxi University, P. R. of China)
1994-1997:	M. S. Degree Shanxi University, P. R. of China Supervisors: Prof. J. Q. Liang
1997-1999:	Lecturer, Department of Physics, Shanxi University, P. R. of China
1999-2002:	Ph. D. Institute of Physics, Chinese Academy of Sciences Title of the research thesis: "The study of the coherent properties of Bose-Einstein Condensates" Supervisors: Prof. J. Q. Liang
2002-present:	Professor Institute of Theoretical Physics, Department of Physics, Shanxi University, P. R. of China

2006-2013:	Vice-Director Institute of Theoretical Physics, Shanxi University, P. R. of China
2013-present:	Sub-Dean College of physics and electronic engineering, Shanxi University, P. R. of China
2019.01-present:	Sub-Dean School of physics Peking University, P. R. of China

PUBLICATIONS

Journal Articles (∗: corresponding author)

87) Zhihong Ren, Yan Li, Yanna Li, Weidong Li* "Development on quantum metrology with Quantum Fisher information", Acta Phys. Sin. **68**, 040601 (2019)

86) Yan Li, Luca Pezze, Weidong Li* and Augusto Smerzi "Sensitivity bound for interferometry with Ising hamiltonians", Phys. Rev. A **99**, 022324 (2019)

85) XinYan Jia, Xiaolei Hao, DaiHe Fan, Weidong Li, Shilin Hu and Jing Chen " Third-order S-matrix study of electron-electron correlation in nonsequential double ionization", J. Phys. B: At. Mol. Opt. Phys. in press (2019).

84) Zhongzhong Qin, Manuel Gessner, Zhihong Ren, Xiaowei Deng, Dongmei Han, Weidong Li*, Xiaolong Su*, Augusto Smerzi and Kunchi Peng " Characterizing the multipartite continuous-variable entanglement structure from squeezing coefficients and the Fisher information", NPJ Quantum information **5**, 3 (2019).

83) Cheng-Bin Zhang, Wei-Dong Li, Ping Zhang, Bao-Tian Wang " First-principles calculations of phase transition, elasticity, phonon spectra, and thermodynamic properties for hafnium", Computational Materials Science **157**, 121-131 (2019).

82) Yan Li, Weidong Li* " Reasonable method to extract Fisher information from experimental data", Physica A **514**, 606-611 (2019).

81) Xiurong Zhang, Weidong Li* " Current-phase relations of a ring-trapped Bose-Einstein condensate with a weak link", Chin. Phys. B **28**, 010303 (2019).

80) Yan Li, Luca Pezze, Manuel Gessner, Zhihong Ren, Weidong Li*, and Augusto Smerzi " Frequentist and Bayesian Quantum Phase Estimation", Entropy **20**, 628 (2018).

79) Jing-Jing Zheng, Wei-Dong Li, Shi-Na Li, Ping Zhang, Bao-Tian Wang " Mechanical and thermodynamic properties of plutonium dihydride", J. of Alloys and Compounds. **750**, 258-264 (2018).

78) Yanna Li, Manuel Gessner, Weidong Li*, and Augusto Smerzi " Hyper- and hybrid nonlocality", Phys. Rev. Lett. **120**, 050404 (2018).

77) Ling Hou, Wei-Dong Li, Fangwei Wang, Olle Eriksson, and Bao-Tian Wang*, " Structural, electronic, and thermodynamic properties of curium dioxide: Density functional theory calculations", Phys. Rev. B **96**, 235137 (2017).

76) Yuan Liu, Zhifang Feng, WeiDong Li*, " Energy sharing induced by the nonlinear interaction", Chin. Phys. B **26**, 013401 (2017).

75) Cheng-Bin Zhang, Xiu-Ping Li, WeiDong Li, Ping Zhang, Wen Yin, Fang-wei Wang, Bao-Tian Wang*, " Structural, electronic, and elastic properties of equiatomic UZr alloys from first-principles", J. Nucl. Mater. **496**, 333–342 (2017).

74) Yanna Li, WeiDong Li*, " Phase Dissipation of an Open Two-Mode Bose-Einstein Condensate", Chin. Phys. Lett. **34**, 070303 (2017).

73) Hui-Jie Zhang, Shi-Na Li, Jing-Jing Zheng, Wei-Dong Li, Bao-Tian Wang*, " Effects of pressure on structural, electronic, and mechanical properties of α, β, and γ uranium", Chin. Phys. B. **26**, 066104 (2017).

72) Jian-Xing Hao, Xiao-Lei Hao*, Wei-Dong Li, Shi-Lin Hu, Jing Chen " Controlling Three-Dimensional ElectronCElectron Correlation via Elliptically Polarized Intense Laser Field", Chin. Phys. Lett. **34**, 043201 (2017).

71) Xiurong Zhang, Francesco Piazza, WeiDong Li*, and Augusto Smerzi, " Parity-symmetry breaking and topological phases in a superfluid ring", Phys. Rev. A. **94**, 063601 (2016).

70) Ruolei Cheng, Tianchen He, Weidong Li*, Augusto Smerzi, " Theory of a Kaptiza-Dirac Interferometer with Cold Trapped Atoms ", Journal of Modern Physics **7**, 2043-2062 (2016).

69) Xiaolei Hao, Zheng Shu, Weidong Li*, Shilin Hu, and Jing Chen, " Quantitative identification of different strong-field ionization channels in the transition regime", Optics Express **24**, 25250-25257 (2016).

68) Luca Pezze, Yan Li, Weidong Li*, and Augusto Smerzi, " Witnessing entanglement without entanglement witness operators ", Proceedings of the National Academy of Sciences of USA **113**, 11459C11464 (2016).

67) Xin-Hai Tu, Xiao-Lei Hao, Wei-Dong Li, Shi-Lin Hu, Jing Chen, " Nonadiabatic Effect on the Rescattering Trajectories of Electrons in Strong Laser Field Ionization Process", Chin. Phys. Lett. **33**, 093201 (2016).

66) C. Wang, M. Okunishi, X. Hao, Y. Ito, J. Chen, Y. Yang, R. R. Lucchese, M. Zhang, B. Yan, W. D. Li, D. Ding, and K. Ueda, " Resonancelike enhancement in high-order above-threshold ionization of polyatomic molecules", Phys. Rev. A. **93**, 043422 (2016).

65) Shilin Hu, Jing Chen, Xiaolei Hao, and Weidong Li, " Effect of low-energy electron interference on strong-field molecular ionization, Phys. Rev. A. **93**, 023424 (2016).

64) Y. Gao, C. Qin, Z. Qiao, B. Wang, WeiDong Li, G. Zhang, R. Chen, L. Xiao and S. Jia, " Observing and tuning the density distribution of localized states of monolayer graphene oxide by using external electric field", Appl. Phys. Lett. **106**, 131103 (2015).

63) Xiu-Rong Zhang and Wei-Dong Li*, "Nonlinear tunneling through a strong rectangular barrier", Chin. Phys. B. **24** (7) 070311,(2015)

62) Bao-Tian Wang, JingJing Zheng, XiaoTian Qu, Wei-Dong Li, Ping Zhang, "Thermal conductivity of UO2 and PuO2 from first-principles", J. of Alloys and Compounds. **628**,267-271 (2015)

61) Wenxue Zhang, Bao-Tian Wang, Xinlin Cui,Li Li and Wei-Dong Li, "Electronic Structure, Mechanics, and Thermodynamics of ZrB12 Under Pressure", Sci. of Adv. Mat.,**6** 2281-2285 (2014)

60) YanNa Li and Wei-Dong Li*, "Bifurcation of a nonlinear Schrodinger equation with a symmetrical double well", J. Phys. B: At. Mol. Opt. Phys. **47** 195301 (2014)

59) JingJing Zheng, Bao-Tian Wang, I.Marco, Wei-Dong Li, "Electronic structure and phase stability of plutonium hydrides: Role of Coulomb repulsion and spin-orbital coupling", Int. J. of Hydrogen Ener. **39**,13255-13265 (2014)

58) WeiDong Li, Tianchen He and Augusto Smerzi, "Multimode Kapitza-Dirac Interferometry with Trapped Cold Atoms", Phys. Rev. Lett. 113,023003 (2014)

57) XiaoLei Hao, J. Chen, Wei-Dong Li, B. B. Wang, X. D. Wang and W. Becker, "Quantum effects in double ionisation of Ar below the threshold intensity", Phys. Rev. Lett. **112** 073002 (2014)

56) Rui Xue, Wei-Dong Li and Zhao-Xin Liang "Collective Excitation and Quantum Depletion of a Bose-Einstein Condensate in a Periodic Array of Quantum Wells", Chin. Phys. Lett. **31** 030302 (2014)

55) Bao-Tian Wang*, Wenxue Zhang, and Wei-Dong Li, "Mechanics, lattice dynamics, and chemical bonding in ZrB2 and ZrB12 from first-principles calculations", Sci. Adv. Mater. **5**, 1916-1921. (2013)

54) M. Y. Wu, Y. L. Wang, X. J. Liu, Wei-Dong Li, XiaoLei Hao and J. Chen, "Effect of electron initial longitudinal velocity on low-energy structure in above-threshold ionisation spectra", Chin. Phys. Lett. **30**, 073202 (2013)

53) XinYang Jia, D. H. Fan, Wei-Dong Li* and J. Chen, "Nonsequential double ionisation of nonaligned diatomic molecules N_2 and O_2", Chin. Phys. B. **22** (1) 013303, (2013).

52) XinYang Jia, XiaoLei Hao, D. H. Fan, Wei-Dong Li* and J. Chen, "S-matrix and semiclassical study of electron-electron correlation in strong-field nonsequential double ionization of Ne", Phys. Rev. A. **88** 033402, (2013)

51) XiaoLei Hao, XuLing Zhang, Wei-Dong Li* and Jing Chen, "Suppressing the effect of polarisation in tunnelling ionisation of the hydrogen atom ", Phys. Rev. A. **87** 045403, (2013)

50) M. Y. Wu, Y. Wang, X. Liu, Wei-Dong Li, X. L. Hao and Jing Chen, "Coulomb-potential effects in non sequential double ionisation under elliptical polarization" Phys. Rev. A. **87** 013431, (2013)

49) C. Y. Wu, Y. D. Yang, Y. W. Liu Q. H. Gong M. Wu, X. Liu X. L. Hao, Wei-Dong Li, X. T. He and J. Chen, "Characteristic spectrum of very low energy photoelectron from above-threshold ionisation in the tunnelling regime" Phys. Rev. Lett. **109** 043001, (2012)

48) Yuan Liu, Weidong Li*, "Fermi-Decay law of Bose-Einstein Condensates trapped in an anharmonic potential", Chin. Phys. Lett. **29** (4) 040304, (2012)

47) Xiao-Lei Hao, Wei-Dong Li *, Liu Jie and Chen Jing,"The effect of electron initial longitudinal velocity on the non-sequential double ionisation process in an elliptically polarised laser field", Chin. Phys. B **21** (8), 083304 (2012).

46) Yuan Liu, Wei-Dong Li*, L. B. Fu and Q. Niu, "Weak force detector by "Atom Interferometers", Eur. J. Phys. D, **66**, 75 (2012).

45) Bao-Tian Wang, Wei-Dong Li, Ping Zhang, "First-principles calculations of phase transition, elasticity and thermodynamic properties for TiZr alloy", J. of Nuc. Phys. **420**, 501-507, (2012).

44) Bao-Tian Wang, Wen Yin, Wei-Dong Li and Fangwei Wang, "First-principles study of pressure-induced phase transition and electronic property of $PbCrO_3$", J. Appl. Phys. **111**, 013503 (2012).

43) Bao-Tian Wang *, Wen Yin, Wei-Dong Li, and Fangwei Wang*, "Structural and electronic properties of Y2CrS4 from first-principles study", Eur. Phys. J. B,**80**, 307-310. (2011).

42) Peng-Fei Zhang, Yuchi Zhang, Gang Li, Jin-Jin Du, Yan-Feng zhang, Yan-Qiang Guo, Jun-Min Wang, Tiancai Zhang and WeiDong li, "Sensitive Detection of Individual Neutral Atoms in a Strong Coupling Cavity QED system", Chin. Phys. Lett., **28**, 044203, (2011);

41) Bao-Tian Wang, Peng Zhang, Han-Yu Liu, Wei-Dong Li and Ping Zhang*, "First Principles calculations of phase transition, elastic modulus and superconductivity under pressure for zirconium", J. of Appl. Phys. **109**, 063514, (2011).

40) XiaoLei Hao, Wei-Dong Li*, J. Liu and J. Chen*, "Effect of electron initial longitudinal velocity on non-sequential double ionization process", Phys. Rev. A. **83**, 053422, (2011).

39) J. G. Cui and Wei-Dong Li*, "Step-like structure and assisted tunneling in two coupled modulated wave guides", Eur. J. Phys. D, **61**, 187-191 (2011).

38) Bao-Tian Wang, Ping Zhang*, Hongzhou Song, Hongliang Shi, Dafang Li, and Wei-Dong Li, "Structural, mechanical, thermodynamic, and electronic properties of thorium hydrides from first-principles", J. Nucl. Mater. **401**, 124-129 (2010)

37) Ji-Feng Jia, Yong-Ping Zhang, Wei-Dong Li and Lu Li*, "Novel Optical modes in the nonlinear double-waveguide structure", Opt. Comm. **283**, 132-137, (2010),

36) Bao-Tian Wang, Ping Zhang*, Hongliang Shi, Bo sun, and Wei-Dong Li, "Mechanical and chemical bonding properties of ground state BeH2", Eur. Phys. J. B. **74**, 303-308. (2010)

35) Bao-Tian Wang, Hongliang Shi, Wei-Dong Li, and Ping Zhang*, "First-principles study of ground state properties and high pressure behavior of ThO2", J. Nucl. Mater. **399**, 181-188. (2010)

34) Bao-Tian Wang, J L Shao, G. C. Zhang, Wei-Dong Li and Ping Zhang*, "Nucleation of hcp and fcc phases in bcc iron under uniform compression: Classical molecular dynamics simulations", J. Phys.: Condens. Matt. **22**, 435404, (2010).

33) Bao-Tian Wang, Hongliang Shi, Wei-Dong Li and Ping Zhang*, "First-principles LDA+U and GGA + U study of neptunium dioxide", Phys. Rev. B. **81**, 045119, (2010).

32) Xin-Yan Jia, Wei-Dong Li*, Jie Liu and J. Chen*, "Alignment-Dependent nonsequential double ionization of molecule in intense laser fields: the role of different valence orbitals", Phys. Rev. A. **80**, 053405 (2009)

31) BaoTian Wang, JianLi Shao, GuangCai Zhang, Wei-Dong Li and Ping Zhang*, "Molecular dynamics simulations of hcp/fcc nucleation and growth in bcc iron driven by uniaxial compression", J. Phys.: Condens. Matt. **21**, 495702, (2009),

30) Jian Zhao, JieLi Qin, Wei-Dong Li*, "The classical Characters of one dimensional quantum oscillator", College Phys. (in Chinese), **28** (10), 14-19, (2009),

29) Jian Li, Wei-Dong Li, Jie Liu and Yi-Sui Sun*, "Large excursions of action within the resonance of a degenerate Hamiltonian system with two degrees of freedom", Phys. Rev. E **80**, 026216, (2009),

28) XiaoLei Hao, G. Q. Wang, XinYan Jia, Wei-Dong Li*, J. Liu and J. Chen*, "Non-sequential double ionization of Ne in an elliptically polarized intensity laser field", Phys. Rev. A **80**, 023408, (2009),

27) Yuan Liu, Xuefeng Zhang, Weidong Li*, "The study of the stability of 1-D confined Bose Einstein condensates based on one novel orthogonal basis", Phys. Lett. A, **373**, 2764-2769, (2009),

26) Rui Xue, Z. X. Liang and Wei-Dong Li*, "Stability Diagrams of a Bose-Einstein Condensate in a Periodic Array of Quantum Wells", Chin. Phys. Lett. **26**, 070303, (2009),

25) ZhiFang Feng, Wei-Dong Li*, L. R. Wang, LianTuan Xiao* and SuoTang Jia, "Optimistic conditions for creating Cs molecular (condensate) by a stimulated Raman adiabatic passage scheme", Phys. Rev. A **80** 043620 (2009),

24) Rui Xue, Wei-Dong Li*, "The Nonlinear Wannier-Kohn function in Kronig-Penney Model", Chin. Phys. B, **18** (10), 4130-4135 (2009),

23) ZhiFang Feng, Wei-Dong Li*, LianTuan Xiao and SuoTang Jia, "Sub-natural linewidth of the probe absorption spectrum in a cold gas of Cs atoms and molecules", Chin. Phys. B, **18** (11), 4901-4905, (2009),

22) Rui Xue, Z. X. Liang and Wei-Dong Li*, "Exact nonlinear Bloch-state solutions for Bose-Einstein condensates in a periodic array of quantum wells", J. Phys. B: At Mol. Opt. Phys. **42**, 085302, (2009)

21) J.-Q. Liang, J.-L. Liu, Wei-Dong Li and Z. -J. Li, "Atom-Pair tunneling in Optical lattices", Phys. Rev. A **79**, 033617, (2009) (arXiv 0803.1889),

20) ZhiFang Fen, Wei-Dong Li*, Lian-tuan Xiao and Suotang Jia, "The double dark resonance in a Cs atom-molecule system", Opt. Exp. **16**, 15870, (2008)

19) Xin-Yan Jia, Wei-Dong Li* and J. Q. Liang, "Nonlinear correction to the Boson Josephson-Function model", Phys. Rev. A, **78** 023613 (2008)

18) Xin-Yan Jia, Wei-Dong Li, J. Fan, Jie Liu and Jin Chen, "Suppression effect in the nonsequential double ionization of molecules by intense laser field ", Phys. Rev. A, **77** 063407, (2008).

17) Xin-Yan Jia, Wei-Dong Li*, J. Q. Liang, "The consistency of the adiabatic and Exact Geometric Phases", International Journal of Modern Physics, B, **22**, No. 8, 1025-1031 (2008)

16) Xin-Yan Jia, Wei-Dong Li*, J. Q. Liang, "The geometric phase of the quantum systems with slow but finite rate of the external time-dependent field", Chinese Physics **16 (10)** 2855-2861 (2007) (in English), (2007),

15) XiaoPeng Sun, ZhiFang Fen, Wei-Dong Li * and Suotang Jia, "The molecule production rate in a Λ configuration atom-molecular three-level system", Acta Physics (in Chinese) **56(10)** 5727-5733, (2007)

14) Xin-Yan Jia, Wei-Dong Li *, H. Ezawa "The symmetry breaking states and bifurcations in Bose-Einstein Condensates in double square well", J. Physics A Math. theor. **40** 6023-6033, (2007)

13) Wei-Dong Li, Jie Liu, "Continuous-measurement-enhanced self-self-trapping of degenerate ultracold atoms in a double well: Nonlinear Quantum Zeno effect", Phys. Rev. A **74**, 063613, (2006)

12) Wei-Dong Li, "The stationary solutions of GP equations in double square well", Phys. Rev. A **74** 063612 (2006)

11) Wei-Dong Li, A. Smerzi, "Nonlinear Kronig-Penney model", Phys. Rev. E. **70** 016605, (2004)

10) Wei-Dong Li, Y. B. Zhang, J. Q. Liang, "Energy band structure and intrinsic coherent properties of two weakly linked Bose-Einstein Condensates", Phys. Rev. A. **67**, 065601, (2003)

9) Y. B. Zhang, Wei-Dong Li, Lu Li and H. J. W. Muller-Kirsten, "Exact calculation of the skyrmion lifetime in a ferromagnetic Bose Einstein condensates", Phys. Rev. A. **66**, 43622, (2002)

8) Wei-Dong Li, Fan Weng-Bing, X. J. Zhou, J. Q. Liang and Wu-Ming Liu, "Rabi oscillation in Bose-Einstein condensates", Comm. Theory Phys. **38**, 547 (2002)

7) X. J. Zhou, Wei-Dong Li, X. Z. Chen, Y. Q. Wang, "Relative phase with the overlap region of two Bose-Einstein Condensates", Chin. Phys. Lett. **19**, 1581, (2002)

6) Wei-Dong Li, X. J. Zhou, Y. Q. Wang, J. Q. Liang and WU-Ming Liu, "Time evolution of the relative phase in two-component Bose-Einstein condensates with a coupling drive", Phys. Rev. A **64**, 015602, (2001)

5) Wei-Dong Li, X. J. Zhou, J. Q. Liang, Y. Q. Wang and Wu-Ming Liu, "Phase dynamics of Bose-Einstein condensates", Phys. Lett. A. **285**, 45, (2001)

4) Wei-Dong Li, Y. Z. Lai and J. Q. Liang, "General formalism of interaction of a three-level atom with cavity fields in the kerr-like medium", J. Modern Optics **48**, 1357, (2001)

3) X. J. Zhou, Y. Q. Wang, Wei-Dong Li, "The study of the phase of Bose-Einstein Condensate", Comm. Theor. Phys. **36**, 3, 267-270, (2001)

2) Wei-Dong Li, Y. Z. Lai and J. Q. Liang, "Effect of Kerr-like medium on atomic level-occupation probability", Opt. Comm. **186**, 303 (2000)

1) Y. Z. Lai, Wei-Dong Li, J. Q. Liang "Adiabatic transfer of atomic level-occupation probability by Kerr-like medium", Opt. Comm. **160**, 240, (1999).

Poster

11) Wei-Dong Li, "Witnessing entanglement with nonlocal operation",Quantum Information and Measurement, 4-6, Apr., Rome, Italy, (2019).

10) Zhihong Ren, Wei-Dong Li, "Characterizing the multipartite continuous-variable entanglement structure from squeezing coefficients and the Fisher information", 12th session of the Young Scholars Symposium on cold atomic Physics and quantum information, 31, July -4, August, Zhuhai, China, (2018).

9) Yan Li, Wei-Dong Li, "Witnessing entanglement without entanglement witness operators", 11th session of the Young Scholars Symposium on cold atomic Physics and quantum information, 29, July -4, August, Shanghai, China, (2017).

8) Wei-Dong Li, Tian-chen He "Multimode Kapitza-Dirac Interferometry with Trapped Cold Atoms", 8th session of the Young Scholars Symposium on cold atomic Physics and quantum information, 7-11, August, Hangzhou, China, (2014).

7) Yuan-Liu, Wei-Dong Li, "Energy sharing induced by nonlinear interaction", International Conference on Frontiers of Cold Atoms and Related Topics, 14-17, May, Hongkong, China, (2012).

6) Yuan-Liu, Wei-Dong Li, "Weak force detector by "atom Interferometers", International Conference on "Quantum science and Technologies" Trento, Italy, (9-12, May, 2011).

5) Xin-Yan Jia, Wei-Dong Li "Nonlinear correction to BJJ model", International conference on "Frontiers of Degenerate Quantum Gases", Center for advanced study of Tsinghua University, Beijing, Oct. 20-24, (2008).

4) Xin-Yan Jia, Wei-Dong Li "Nonlinear correction to BJJ model", 2008 Symposium for Young Researchers "Quantum manipulation of Photons and Atoms", Beijing University, Beijing, China, Oct. 14-18, (2008).

3) Wei-dong Li, Jie Liu, "Continuous Measurement Enhanced Self-Trapping of Degenerate Ultra-Cold Atoms in a Double-Well: Nonlinear Quantum Zeno Effect", CASTU, Tsinghua University, Beijing, China, Dec. 4-8, (2006).

2) Wei-dong Li, A. Smerzi, "The Generalized Bloch States with a BEC in a Kronig-Penney Potential", QFS2004: International Symposium on Quantum Fluids and SOlids Trento, Italy (2004),

1) Wei-dong Li, A. Smerzi, "On the nonlinear Kronig-Penney mode", The Second international workshop: Theory of quantum gases and Quantum Coherence, Levico (Trento, Italy) (2003),

Seminars

1) "Energy band structure and intrinsic coherent properties of two weakly linked Bose-Einstein Condensates", Trento, Italy, (2002)

2) "Stability of the attractive 1-D Bose-Einstein Condensates", International Symposium on Cold Atom Physics (ISCAP-II), Hangzhou, China, (2006)

3) "The stationary solutions of G-P equations in double square well", WuHan, 2005 CPS Full Metting, (2005)

4) "Suppression Effect in the Non-Sequential Double Ionization of Molecules by Intense Laser Field", Nanjing, 2007 CPS Full Metting, (Speaker is my student: XinYan Jia), (2007)

5) "One exact solution of Gross-Pitaevskii Equation and it's application", Exactly solvable models and their applications in Cold atomic systems, HongKong, 21th, Jun.,(2008)

6) "Novel phenomena in Ultra-Cold Degenerate Quantum Gases", the 9th Annual Workshop on Nanophotonics, Beijing-Taiyuan, (2009).

7) "Theory on Quantum Physics and its applications", 27, March. Tokyo Denki University, Japan, (2012)

8) "Multimode Kapitza-Dirac interferometry with trapped Cold Atoms", LENS-Q* Joint Seminar, at at Lens, Aula Querzoli, July 14, (2014).

9) "Fisher information and multipartite entanglement" in QSTAR, Apr. Florence, Italy, (2015).

10) "Multimode Kaptiza-Dirac interferometry with trapped Cold Atoms", QSTAR, Jun. Florence, Italy, (2015).

11) Series seminar (10 hours) of "Quantum metrology with Fisher information" In Wuhan institute of physics and mathematics, Chinese Academy of Science, Wuhan, China, Dec. (2017)

12) "Quantum metrology with Fisher information", LENS-QSTAR Joint Seminar, 4th May, - 3 Aug., Florence, Italy. (2018).

    - Lecture 1: Brief introduction on Quantum metrology
    - Lecture 2: Quantum entanglement (generating and quantifying)
    - Lecture 3: Phase encoding (Controllable Quantum Dynamics)
    - Lecture 4: Phase estimation (Bayesian and Frequency Bounds)
    - Lecture 5: Some discussion on exactly solvable model and quantum metrology

13) “Brief introduction on Fisher information and its application in quantum metrology”, Zhejiang Normal university, Oct. (2018).

Teaching Experience

Lectures

1) Shanxi University, the first semester 1997-1998, 2004-2005 lectures on "Classical Mechanics"

2) Shanxi University, the second semester 2005-2009, lectures on "Quantum Statistics".

Contracts, Fellowships

10) Visiting Scholar,
QSTAR, CNR-INO,
2th - 18 Apr., 2019. Florence, Italy.

9) Visiting Scholar,
QSTAR, CNR-INO,
4th May, - 3 Aug., 2018. Florence, Italy.

8) Visiting Scholar,
QSTAR, CNR-INO,
1th Apr. - 30 June, 2015. Florence, Italy.

7) Visiting Scholar,
QSTAR, European Laboratory for Non-linear Spectroscopy,
27th June - 16 July, 2013. Florence, Italy.

6) Visiting Scholar,
Laboratory of Theoretical Physics and Statistical Models, University of Paris 11
1th Mar. - 31 May, 2010. Paris, France.

5) Visiting Scholar,
Department of Physics, The Chin. Univ. of Hong Kong
1th Nov. to 30th Nov. 2008, HongKong, China,

4) Visiting Scholar,
Institute of Physics, CAS,
01th Sept. to 01th Oct. 2008, Beijing, China,

3) Visiting Scholar,
Department of Physics, University of Texas at Austin,
28th Feb. to 28th May. 2007, Austin, USA

2) Visiting Scholar,
Institute of Applied Physics and Computational Mathematics,
Oct. 10, 2005 to Jan. 10, 2006, Beijing, China

1) Post-doctoral Fellowship,
Istituto Nazionale per la Fisica della Materia BEC-CRS
and Dipartimento di Fisica,
Universita di Trento, 2002-2004, Trento, Italy

Research Grants

11) Research Grant (NSFC) "Study on quantum metrology in the form of quantum Fisher information", N:11874247, 2019-2022,

10) Research Grant (973 Program of China) "Precision measurement of the small Body Association of atoms", N: 2017YFA0304501, 2017-2022,

9) Research Grant (NSFC) "Quantum effect on ionization of atoms and molecules in ultra-short intense laser fields", N:11504215, 2016-2018,

8) Research Grant (NSFC) "Quantum Control and generation of entanglement with Bose Einstein Condensates", N:11374197, 2014-2017,

7) Research Grant (863 Program of China) "Integrated application of optical fiber quantum communication demonstration of system technology integration and application of network Metro optical Fiber Quantum network", N: 2011AA010801, 2012-2014,

6) NCET of the Ministry of Education of China (NCET-08-0883) (2008-2011),

5) Research Grant (973 Program of China) "Study on the properties of the optical spectrum of new type molecular and its production with the poto-association method", N: 2006CB921603, 2007-2009,

4) Research Grant (NSFC) "Anderson like localization and it's coherence control on ultra-cold degenerate Boson atomic gases", N:10674087, 2007-2009,

3) Research Grant (Shanxi Province) "The nonlinear quantum thoery on Bose-Einstein Condensates", N:200611004, 2006-2008,

2) Research Grant (NSFC) "Nonlinear Bloch Theory", N: 10444002, 2005-2006

1) Research Grant (Shanxi Province), "The study on the coherent properties of Bose-Einstein Condensates", N: 2001102, 2001-2003

Foreign University sojourns

2) Department of Physics, University of Texas at Austin, 28th Feb. to 28th May. 2007,

1) Dipartimento di Fisica, Universita di Trento, Spt. 2002- Aug. 2004.

Organization of Conferences

3) the 9th Annual Workshop on Nanophotonics, Beijing-Taiyuan, Organized by Wei-Dong Li, J. Q. Liang and C.C Sun (the taiyuan section) (2009)

2) Workshop on cold atom and quantum information for younger researchers in China, 2th-7th July, 2007, Organized by Shu. Yi, Biao. Wu, YunBo Zhang and Weidong Li

1) Mini-workshop on Spintornics, June, 2007, Organized by Wei-Dong li, J. Q. Liang and Q. Niu

Invited talks

5) "Quantum metrology with Fisher information", The 16th conference on the low temperature physics in China, 23th April, (2018)

4) "The ionization of atom with high electronic field", The 5th Youth symposium on optical physics, Taiyuan, Shanxi, China, Aug. (2013).

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