牛冬梅

个人简介

牛冬梅

副教授。1991年于武汉大学获理学学士学位，2006年于中国科学院安徽光学精密机械所学获理学博士学位，2008年3月-2010年2月于日本理化学研究所合作研究 。

主要研究领域为激光与固体材料、气相分子、团簇的相互作用，半导体界面与表面，以及材料电子结构。发现了纳秒激光电离团簇的库仑爆炸现象，并首次提出了一个多光子电离引发-逆韧致吸收加热-电子碰撞电离的三步模型，为丰富和完善激光与物质相互作用实验和理论做出了贡献。在高分辨光电子影像系统，气溶胶飞行时间质谱设计与制造积累了多年的经验。最近几年专注于利用自旋分辨-时间分辨-动量分辨的光电子能谱技术（STARPES）研究固体材料的界面电子结构以及光激发超快动力学过程。在Appl. Phys. Lett.，J. Chem. Phys, J. Phys. Chem. 等国际期刊发表SCI论文40余篇。

讲授课程

主讲《量子力学》、《应用光学》、《激光原理》、《光电子技术》、《普通物理学》《大学物理》ABCD等，以及《现代物理分析与测试技术》（研究生课程）等课程。

科研方向

1. 界面与表面物理
2. 超快飞秒激光动力学过程
3. 超强激光场中团簇的库仑爆炸过程

学术成果

参编《现代谱学》(科学出版社)，主笔第九章光电子能谱。

发表论文40余篇，简列如下：（标*号为通讯作者）

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1. Lu Lyu, Dongmei Niu*, Haipeng Xie, Yuan Zhao, Ningtong Cao, Hong Zhang, Yuhe Zhang, Peng Liu, Yongli Gao, The correlations of the electronic structure and film growth of 2,7-diocty [1] benzothieno [3,2-b] benzothiophene (C8-BTBT) on SiO2, Phys. Chem.Chem. Phys. 2017,19(2)1669-1676.
2. Menglong Zhu,; Lu Lyu, Dongmei Niu*, Hong Zhang, Yuhe Zhang, Peng Liu, Yongli Gao, Interfacial chemical and electronic structure of cobalt deposition on 2,7-dioctyl[1]benzothieno [3,2-b]benzothiophene (C8-BTBT), Appl. Surf. Sci.,2017, 402,142-146,
3. Can Wang, Dongmei Niu*, Baoxing Liu, Shitan Wang, Xuhui Wei, Yuquan Liu, Haipeng Xie, Yongli Gao, Charge Transfer at the PTCDA/Black Phosphorus Interface, J. Phys. Chem. C,121(33)18084-18094
4. Shitan Wang, Dongmei Niu*, Lu Lyu, Yingbao Huang, Xuhui Wei, Can Wang, Haipeng Xie, Yongli Gao, Interface electronic structure and morphology of 2,7-dioctyl[1]benzothieno[3,2-b] benzothiophene (C8-BTBT) on Au film, Appl. Surf. Sci.,2017, 416,696-703
5. Can Wang, Dongmei Niu*, Haipeng Xie, Baoxing Liu,; Shitan Wang, Menglong Zhu, Yongli Gao, Electronic structures at the interface between CuPc and black phosphorus，J.Chem. Phys.,2017,147, 064702.
6. Haipeng Xie, Dongmei Niu*, Lu Lyu, Di Wu, Yongli Gao*, Evolution of the electronic structure of C60/LSMO interface， Appl. Phys. Lett.,2016,108, 011603.

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二、 第一作者论文

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4. Dongmei Niu, Haiyang Li*, Sh
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三、 既非通讯作者也非第一作者论

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