Dr. Archana Dubey

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EMPLOYMENT HISTORY:

2006 – Current	Lecturer Department of Physics, University of Central Florida, Orlando, FL
2002 – 2006	Visiting Assistant Professor Department of Physics, University of Central Florida, Orlando, FL
2001 – 2002	Adjunct Professor Department of Physics, University of Central Florida, Orlando, FL
2001 - 2002	Post doctoral Research Associate Department of Physics, University of Central Florida, Orlando, FL
Summer 2001	Adjunct Professor Department of Physics, Valencia Community College, Orlando, FL
1998 – 1999	Post Doctoral Research Associate RPI, Troy, NY
1995 – 1997	Assistant Professor Department of Physics, Bhavnagar University, Bhavnagar, India

SUMMER APPOINTMENTS

5/27-8/1, 2014	Visiting Faculty Materials Science Division, Argonne National Laboratory, IL
5/28-8/2, 2013	Visiting Faculty Materials Science Division, Argonne National Laboratory, IL
6/11-8/15, 2012	Visiting Faculty Materials Science Division, Argonne National Laboratory, IL

EDUCATION:

Ph.D., Physics, Bhavnagar University, Bhavnagar, India, 1998

MS, Physics, Bhavnagar University, Bhavnagar, India, 1993

BS, Physics, Bhavnagar University, Bhavnagar, India, 1991

AWARDS AND HONORS:

- Teaching Incentive Program (TIP) Award, University of Central Florida, 2010-2011.
- Honoree, "Women Making History Celebration", Mar 5, 2008.
  Women's Research Center, University of Central Florida, Orlando, FL.
- M. Hildred Blewett Scholarship from American Physical Society, 2007
  http://www.aps.org/publications/apsnews/200708/dubey.cfm
- Honoree, Women's Research V, "Honoring the Women of Physics", Oct 20, 2005.
  Women's Research Center, University of Central Florida, Orlando, FL.

PUBLICATIONS:

1. Electronic Structure Study of Certain Rhizoferrin Analogs and its Ferric-Ion Complexes - A. Dubey and O. Heinonen- under preparation, to be submitted to BioMetals.
2. First-Principles Electronic Structure Study of Rhizoferrin and its Fe(III) Complexes – A. Dubey and O. Heinonen, BioMetals. 26 (2013) 1003–1012.
3. First principles Electronic Structure Investigation of Order of Singlet and Triplet States of Oxyhemoglobin and Analysis of Possible Influence of Muon Trapping-S. R. Badu, R. H. Pink, R. H. Scheicher, Archana Dubey and N. Sahoo, et al, Hyperfine Interact. 197(2010), 331-340.
4. Theoretical Investigation of Nuclear Quadrupole Interactions in DNA at First–Principles Level- Dip N. Mahato, Archana Dubey, R.H. Pink, R.H. Scheicher, K. Nagamine, E.Torikai, H.P.Saha, Lee Chow, M.B. Huang, T.P. Das, Hyperfine Interact. 181 (2008) 81–86.
5. Investigation of the Hyperfine Properties of deoxyHemoglobin based on its Electronic Structure obtained by Hartree-Fock Roothaan Procedure.- K. Ramani Lata, N. Sahoo, Archana Dubey, R.H. Scheicher, S.R. Badu, R.H. Pink, Dip N. Mahato, A.F. Schulte, H.P. Saha, N.B. Maharjan, Lee Chow, T.P. Das, Hyperfine Interact. 181 (2008):75–80.
6. First-Principles Hartree-Fock Cluster Study of Very Dilute Transition Metal And Rare-Earth Ion Systems In Silicon -R.H. Pink, S.R. Badu, A. Dubey, R.H. Scheicher, J.Jeong, S.R. Byahut, L. Chow, M.B. Huang, T.P. Das, American Institute of Physics, Conference Proceedings, #1003, 235-244 (2008) [Proceedings of International Conference on Magnetic Materials, 2007].
7. Nuclear Quadrupole Interactions and Electronic Structure of BF_3-H_2O Complex- Archana Dubey, H. P. Saha, R. H. Pink, Dip N. Mahato, R. H. Scheicher, Mahendra K. Mahanti, Lee Chow, T. P. Das. Hyperfine Interactions (Springer) 176, 45(2007).
8. Theory of Electronic Structure and Nuclear Quadrupole Interactions in the BF_3-NH_3 Complex and its Methyl Derivatives- R. H. Pink, Archana Dubey, Dip N. Mahato, R. H. Scheicher, Mahendra K. Mahanti, M. B. Huang, H. P. Saha, Lee Chow, T. P. Das, Hyperfine Interactions (Springer) 176, 39(2007).
9. First Principles Study of Nuclear Quadrupole Interactions in the Molecular Solid BF_3 and the nature of binding between the Molecules-Dip N. Mahato, R. H. Pink, R. H. Scheicher, Archana Dubey, H.P. Saha**,** Lee Chow, Mahendra K. Mahanti, T. P. Das, Hyperfine Interactions (Springer) 176, 15 (2007).
10. Thickness Dependence of the Magnetic Hysteresis of NiFe-31% Films as a Function of an Applied Isotropic In-plane Stress- Claude Garrett, Patrick Holland, Wilhelmus J. Geerts, Dustin Ragan, Archana Dubey, Steve Rios, Anup K. Bandyopadhyay, J. Appl. Phys. 93 (2003) pp. 8624-8626.
11. Magnetic Hysteresis Measurements of Thin Films of NiFe-31% under Isotropic Stress- Patrick Holland, Mary Kempton, Dustin Ragan, Steve Rios, Anup K. Bandyopadhyay, Archana Dubey, Wilhelmus J. Geerts, J. Magn. Magn. Mat. 250 (2002) L1-L5.