



Hamed Najafi Ashtiyani

Associate Professor

College: Faculty of Basic Sciences

Department: Department of Basic Sciences

Education

Degree	Graduated in	Major	University
BSc	2002	physics	University of Birjand
MSc	2007	Solid State of Physics	Sistan & Balouchestan University
Ph.D	2017	Solid State of Physics	University of Mazandaran - University of Sydney Australia

Employment Information

Faculty/Department	Position/Rank	Employment Type	Cooperation Type	Grade
(not set)	(not set)	Tenured	Full Time	20

Papers in Conferences

1. حامد نجفی آشتیانی، بررسی اثر دمای بازیخت در پدیده پلاسمون های سطحی جایگزیده متاثر از عمق نفوذ و اندازه ی نانو ذرات نقره در محیط پیرامونی نیمه رسانای اکسید تنگستن، دومین همایش ملی محاسبات نرم علوم مهندسی در صنعت و جامعه، شماره صفحات ۶، ایرانشهر - دانشگاه ولایت، ۱۴۰۱.

Papers in Journals

1. Hamed Najafi ,& Ashtiani, The effect of different surface morphologies on WO₃ and WO₃-Au gas-sensors performance, Journal of Materials Science: Materials in Electronics, Vol. 30, pp. 12224-12233, 2019.
2. A. Rahdar , A. Moradi Kor , H. Najafi ,& Ashtiani, Effect of mass fraction of water nanodroplet and water content on the localization location of dye within microemulsion, Journal of Color Science and Technology, Vol. 18, pp. 1, 2019.
3. Hamed Najafi ,& Ashtiani, Behnam Akhavan, Fengjuan Jing, Marcela M. Bilek, Transparent Conductive Dielectric-Metal-Dielectric Structures for Electrochromic Applications Fabricated by High-Power Impulse Magnetron Sputtering, ACS Applied Materials & Interfaces, Vol. 16, No. 11, pp. 14871-14881, 2019.

4. Hamed Najafi ,& Ashtiani,Low temperature processing of BaTiO₃-PMMA-PVP hybrid films as transparent dielectric gate,Journal of Materials Science: Materials in Electronics,Vol. 30,No. 7,pp. 7087-7094,2019.
5. A Rahdar, H Najafi ,& Ashtiani, E Sanchooli,Fluorescence and dynamics studies of dye-biomolecule interaction in the nano-colloidal systems,Journal of Molecular structure,Vol. 1175,pp. 821-827,2019.
6. Hamed Najafi ,& Ashtiani, Marcela M. Bilek, Behnam Akhavan,Tungsten oxide thin films for electrochromic applications: Pulse width-controlled deposition by high-power impulse magnetron sputtering (HiPIMS),Advanced Engineering Materials,2024.
7. Hamed Najafi ,& Ashtiani, Fengjuan Jing, Dougal G. McCulloch, Behnam Akhavan,ITO-free silver-doped DMD structures: HiPIMS transparent-conductive nano-composite coatings for electrochromic applications,Solar Energy Materials and Solar Cells,2021.
8. H Najafi ,& Ashtiani, A Tavousi, A Ramzannezhad, A Rahdar,Solution-Processable LaTiO_x-PVP as Silicon-Free Gate Dielectric at Low Temperature for High-Performance Organic-Inorganic Field Effect Transistors,Journal of Electronic Materials,pp. 1-8,2021,JCR.
9. A. Rahdar , A. Moradi Kor , H. Najafi ,& Ashtiani,Effect of mass fraction of water nanodroplet and water content on the localization location of dye within microemulsion,Journal of Color Science and Technology,Vol. 14,No. 1,pp. 63-71,2020.
10. Hamed Najafi ,& Ashtiani,The effect of different surface morphologies on WO₃ and WO₃-Au gas-sensors performance,Journal of Materials Science: Materials in Electronics,Vol. 30,No. 13,pp. 12224-12233,2019.
11. Hamed Najafi ,& Ashtiani, Behnam Akhavan, Fengjuan Jing, Marcela M. Bilek,Transparent Conductive Dielectric-Metal-Dielectric Structures for Electrochromic Applications Fabricated by High-Power Impulse Magnetron Sputtering,ACS Applied Materials & Interfaces,Vol. 11,pp. 14871-14881,2019.
12. Hamed Najafi ,& Ashtiani,Low temperature processing of BaTiO₃-PMMA-PVP hybrid films as transparent dielectric gate,Journal of Materials Science: Materials in Electronics,Vol. 30,pp. 7087-7094,2019.
13. Hamed Najafi-Ashtiani, Ali Bahari, Samira Gholipour, Siamak Hoseinzadeh,Structural, optical and electrical properties of WO₃-Ag nanocomposites for the electro-optical devices,Applied Physics A,Vol. 124,pp. 24-33,2018.
14. A Rahdar, H Najafi ,& Ashtiani, E Sanchooli,Fluorescence and dynamics studies of dye-biomolecule interaction in the nano-colloidal systems,Journal of Molecular structure,Vol. 1175,pp. 821-827,2018.
15. Behnam Akhavan, Sadra Bakhshandeh, Hamed Najafi ,& Ashtiani, Ad C. Fluit, Edwin Boel, Charles Vogely, Bart C. H. van der Wal, Amir A. Zadpoor, Harrie Weinans, Wim E. Hennink, Marcela M. Bilek and Saber Amin Yavari,Direct covalent attachment of silver nanoparticles on radical-rich plasma polymer films for antibacterial applications,Journal of Materials Chemistry B,Vol. 6,pp. 5845-5853,2018.
16. Hamed Najafi ,& Ashtiani,Performance evaluation of free-silicon organic-inorganic hybrid (SiO₂-TiO₂-PVP) thin films as a gate dielectric,Applied Surface Science,Vol. 455,pp. 373-378,2018.
17. H. Najafi ,& Ashtiani, S. Gholipour, A. Rahdar,Surface plasmon resonance effect for a new structure of Ag/WO₃ nanorod-shell nanocomposites and application in smart window,Journal of Molecular structure,Vol. 1169,pp. 25-30,2018.
18. Hamed Najafi ,& Ashtiani,Investigation of pulse width effect on structural and optical properties of molybdenum oxide thin films deposited by HiPIMS,Iranian journal of physics research,Vol. 18,No. 3,pp. 427-435,2018.
19. Hamed Najafi-Ashtiani, Ali Bahari, Samira Gholipour,Investigation of coloration efficiency for tungsten oxide-silver nanocomposite thin films with different surface morphologies,Journal of Materials Science: Materials in Electronics,Vol. 29,pp. 5820-5829,2018.
20. A. Bahari , A. Ramzannezhad, D. Shajari, H. Najafi ,& Ashtiani,Nanostructural and electrical properties of LA_{0.5}SR_{0.5}CoO₃,International Journal of Modern Physics B,Vol. 31,No. 4,pp. 1750015-1,2017.

21. Hamed Najafi ,& Ashtiani, Ali Bahari,Optical, structural and electrochromic behavior studies on nanocomposite thin film of aniline, o-toluidine and WO₃,Optical Materials,Vol. 58,pp. 210-218,2016.
22. Hamed Najafi ,& Ashtiani, Ali Bahari, Shahram Ghasemi,A dual electrochromic film based on nanocomposite of copolymer and WO₃ nanoparticles: Enhanced electrochromic coloration efficiency and switching response,Journal of Electroanalytical Chemistry,Vol. 774,pp. 14-21,2016.
23. Najafi ,& Ashtiani, Hamed, Ali Bahari, Shahram Ghasemi,A dual electrochromic film based on nanocomposite of aniline and o-toluidine copolymer with tungsten oxide nanoparticles,Organic Electronics,Vol. 37,pp. 213-221,2016.
24. Hamed Najafi ,& Ashtiani, Ali Bahari,Optical and cyclic voltammetry behavior studies on nanocomposite film of copolymer and WO₃ grown by electropolymerization,Synthetic Metals,Vol. 217,pp. 19-25,2016.
25. Hamed Najafi ,& Ashtiani, M. S. Hadavi,Electro-optical evaluation of tungsten oxide and vanadium pentoxide thin films for modeling an electrochromic device,Iranian Journal of Physics Research,Vol. 14,No. 4,pp. 231-240,2015.
26. Hamed Najafi ,& Ashtiani, M. Najafi_Ashtiani,Comparative Evaluation Between Rigid and Dynamic Spinal Fixation Systems: A Three-Dimensional Finite Element Analysis,Zahedan Journal of Research in Medical Sciences,Vol. 17,No. 8,2015.
27. Hamed Najafi ,& Ashtiani, M. Najafi_Ashtiani,Finite Element Analysis on Iliosacral Screw Fixation for Sacral Stress Fracture: A Comparison between Three Systems,Zahedan Journal of Research in Medical Sciences,Vol. 16,No. 1,2014.
28. Ashtiani, M. N., H. Najafi , Ashtiani, M. Rostami , Ghomi, and A. Heidarnejad,Developing a Device for Automated Peritoneal Dialysis,Journal of Biomedical Physics and Engineering,Vol. 2,No. 2,2012.
29. Ashtiani, M. N., M. Tafazzoli , Shadpour, and H. Najafi , Ashtiani,Evaluation of the Droplet Collapsibility in Inhalation Drug Delivery through a 3D Computational Study,Journal of Biomedical Physics and Engineering,Vol. 2,No. 3,2012.
30. Habibi , Khorassani, Sayyed Mostafa, Malek Taher Maghsoodlou, Nourallah Hazeri, Khatereh Bagherpour, Mohsen Rostamizadeh, and Hamed Najafi , Ashtiani,Chemoselective Synthesis of New Stable Phosphorus Ylides from the Reaction Between Triphenylphosphine and Activated Acetylenic Esters in the Presence of Heterocyclic Biological Bases,Phosphorus, Sulfur, and Silicon,Vol. 16,No. 1,pp. 21-30,2011.