Ali khayatian

Education:
B.Sc. in physics: Isfahan University of Technology, Isfehan, Iran.

M.Sc. in solid state physics: University of kashan, kashan,
Title of M. Sc. Thesis: "Fabrication and analysis of magnetic Co nanowire", supervisor: M. Almasi Kashi, A. Ramazani.

Ph.D in solid state physics: University of Kashan, Kashan,
Title of Ph.D. Thesis: "Parameters variation of ZnO nanorods sensors due to Fe and Cu impurities", supervisor: M. Almasi Kashi, R. Azimirad.

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Academic Position:
Assistant Professor

Research area:
Nanomaterials;
Thin films; ZnO nanostructures;
UV & gas sensors;

Courses:
Physics 1, 2, 3; Fluid mechanics; Semiconductors; Electromagnetic; Analytical mechanics;

Students:

Ph.D.

S. F. Akhtarian Far (Graduated);
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F. Zareeafar (Graduated);
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Publications:

1- The influence of the ac electrodeposition conditions on the magnetic properties and microstructure of Co nanowire arrays, M Almasi Kashi, A Ramazani and A Khayyatian, J. Phys. D: Appl. Phys. 39 (2006) 4130–4135.

2- The Influence of the concentration on the ordering of Pore Formation in long time anodization of Anodic Alumina, A. Ramazani, M. Almasi Kashi, A. Khayyatian and R. Golipour, IJNN (1381).

3- R. Golipour, A. Khayyatian, A. Ramazani, M. Almasi Kashi, The effect of crystalliane and shape anisotropy on the magnetic properties of Co and Ni nanowires, Irannian Journal of Physics Research, 7(2) (2007).

4- M. Almasi Kashi, A. Ramazani, H. Abbasian, A. Khayyatian, Capacitive humidity sensors based on large diameter porous alumina prepared by high current anodization, Sensors and Actuators A 174 (2012) 69– 74.

5- H Abasian, M Almasi Kashi, A Ramazani, A Khayatian, The effect of different oxide layers on the sensing properties of anodic alumina nanoporous film, Irannian Journal of Physics Research, 13(4) (2013).

6- A Khayatian, M Almasi Kashi, R Azimirad and S Safa, Enhanced gas-sensing properties of ZnO nanorods encapsulated in an Fe-doped ZnO shell, J. Phys. D: Appl. Phys. 47 (2014) 075003.

7- Azimirad, R., et al. "Electrical investigation and ultraviolet detection of ZnO nanorods encapsulated with ZnO and Fe-doped ZnO layer." Journal of sol-gel science and technology 71.3 (2014): 540-548.

8- R. Azimirad, A. Khayatian, S. Safa, M. Almasi Kashi, Enhancing photoresponsivity of ultra violet photodetectors based on Fe doped ZnO/ZnO shell/core nanorods, Journal of Alloys and Compounds 615 (2014) 227–233.

9- S. Safa, R. Azimirad, Kh. Mohammadi, R. Hejazi, A. Khayatian, Investigation of ethanol vapor sensing properties of ZnO flower-like nanostructures, Measurement 73 (2015) 588–595.

10- A. Khayatian, M. Almasi Kashi, R. Azimirad, S. Safa, S.F.Akhtarianfar Akhtarian, Effect of annealing process in tuning of defects in ZnO nanorods and their application in UV photodetectors, Optik 127 (2016) 4675–4681,

11- S. Safa, A. Khayatian, E. Rokhsat, M. Najafi, Investigation of Structural, Optical, and Photocatalytic Properties of Hydrothermally Synthesized ZnO Nanorod Arrays with Various Aspect Ratios, Journal of Advanced Materials and Processing, 3(4) (2015) 51-64.

12- Seyed Farshad Akhtarianfar, Ali Khayatian, Mohammad Almasi-Kashi, Large scale ZnO nanorod-based UV sensor induced by optimal seed layer, Ceramics International 42 (2016) 13421–13431.

13- A Khayatian , S Safa, R Azimirad, M Almasi Kashi, S F Akhtarianfar, The effect of Fe-dopant concentration on ethanol gas sensing properties of Fe doped ZnO/ZnO shell/core nanorods, Physica E 84 (2016) 71-78.

14- Mokhtari S, Safa S, Khayatian A, Azimirad R. Effects of Chromium Dopant on Ultraviolet Photoresponsivity of ZnO Nanorods. Journal of Electronic Materials. July 2017, Volume 46, Issue 7, pp 4250–4255

15- Khayatian A, Asgari V, Ramazani A, Akhtarianfar SF, Kashi MA, Safa S. Diameter-controlled synthesis of ZnO nanorods on Fe-doped ZnO seed layer and enhanced photodetection performance. Materials Research Bulletin. 2017 Oct 31;94:77-84.

16- Akhtarianfar SF, Khayatian A, Shakernejad R, Almasi-Kashi M, Hong SW. Improved sensitivity of UV sensors in hierarchically structured arrays of network-loaded ZnO nanorods via optimization techniques. RSC Advances. 2017;7(51):32316-26.

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19- R. Shakernejad, A. Khayatian, A. Ramazani, S.F. Akhtarianfar, M. Almasi Kashi, The role of different initial rest times on synthesized buffer layer and UV sensing of ZnO nanorods grown on rotational substrate, Journal of Materials Science: Materials in Electronics 2018; 29:8303–8312.

20- E Rokhsat, A khayatian, Enhanced photocatalytic activity of Fe doped ZnO hierarchical nanosheets on the degradation of p-nitrophenol under visible light, Inorganic and Nano-Metal Chemistry 2018.

21- A. Khayatian, M. Almasi Kashi, R. Azimirad, R. shakernejad and S. Safa, Effect of Cu dopant on ultra violet photodetector based on ZnO Nanorods, Iranian Journal of Physics Research, 2019; 19 (3).

22- S. M. A. Rastialhosseini, A. Khayatian, R. Shariatzadeh, M. Almasi Kashi, Three-dimensional ZnO nanorods growth on ZnO nanorods seed layer for high responsivity UV photodetector, Applied Physics A, 2019; 125: 829.

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Conference papers:

۱- سید مصطفی ساداتی، حسین تارقلی زاده، امید بیات ، علی خیاطیان، ذخیره سازی هیدروژن در آلیاژ $LaNi_5$ ، سومین سمینار پیل سوختی ایران (۱۳۸۸).

۲- ساداتی، سید مصطفی، تارقلی زاده، حسین؛ خیاطیان، علی؛ طحان، امین، طراحی و ساخت دستگاه اندازه گیری جذب گاز در مواد، کنفرانس فیزیک ایران (۱۳۸۹).

3- Seyed Farshad Akhtarianfar, Suck Won Hong, Ali khayatian, Mohammad Almasi kasha, Fabrication of field-effect transistor (FET) based on ZnO nanowire/grapheme nanoribbon heterostructures, 5th RIAPA Meeting On Low Dimensional Systems :RIAPA-LDS 2017 -23 & 24 MAY, Research Institute for Applied Physics & Astronomy, University of Tabriz, Tabriz, Iran.

4- R. Shakernejad, A. Khayatian, A. Ramazani, S.F. Akhtarianfar, M. Almasi Kashi, UV photodetecting performance analysis of zno nanorod arrays grown on rotating substrate:

Evaluation of the initial rest time, International Biennial Conference on UltraFine Grained and Nanostructured Materials (UFGNSM), 12-13 November 2017, International Convention Center, Kish Island, Iran.

5- Z. haji jamali, A. Khayatian, M. Almasi Kashi, Improvement of Ultra-Violet Sensory of ZnO Nanorods Array Grown In Solution Including Zno Nrs, International Congress on Nanoscience & Nanotechnology (ICNN2018), 26-28 September 2018, Research Institute of petroleum Industry, Tehran, Iran.

6- Z. haji jamali, A. Khayatian, M. Almasi Kashi, ZnO Nanorods Spin Coating on ZnO Nanorods Array in Different Growth Steps, International Congress on Nanoscience & Nanotechnology (ICNN2018), 26-28 September 2018, Research Institute of petroleum Industry, Tehran, Iran.

7- F. Zareafar, A. khayatian, R. Shakernejad, Effect of zinc salt concentration on electrical property of ZnO nanorods, 2th International Conference on modern technologies in sciences 13 March 2019, Amol University of special modern technologies.