Academic Curriculum Vitae



Full Name: Abdullah Othman Hamza Academic Title: Lecturer Email: abdulla.hamza@su.edu.krd Mobile:009647504496174



2019 – PhD (Doctor of Philosophy) 2007 – MSc (Master of Science) 2003 – BSc (in Physics)

Employment:

- Employed since 2007- Salahaddin university

Qualifications

2019 - PhD (Doctor of Philosophy)

Faculty of Science and Engineering Department of Physics and Mathematics University of Hull/UK Thesis Title: Controlling Forster Resonance Energy Transfer Using Plasmonic Nanogap structures.

2007 – MSc (Master of Science)

Department of Physics Salahaddin University/ Erbil-Iraq Thesis Title: Determination of Interface State Density Using (C-V-w) and (Gp-w) Method for different MNOS Structures.





2003 – BSc (in Physics)

Department of Physics Salahaddin University/ Erbil-Iraq

Training courses

- English language courses from Manchester international college.
- Hull university English language course.
- Sheffield University English language test.
- IELTS test (6.0) overall.
- Liquid Nitrogen course (Hull University)
- Lab safety Equipment's course (Hull University)
- Laser safety course (Hull University).
- Modelling Nanostructures course.

Teaching experience:

I have taught a wide range of subjects at undergraduate level including:

- 1- Advanced Calculus: 2nd year Physics
- 2- Electricity and Magnetism: 1st year Physics
- 3- Mathematical Physics: 3rd year Physics.
- 4- Statistical Mechanics: 3rd year Physiscs.
- 5- LASER and Optical Communication Systems. 4th year communication Physics.
- 6- Optical Spectroscopy. 3rd year physics.
- 5- Demonstrating at undergraduate physics labs.
- 6- Supervising many undergraduate students.

7- I worked with Nano3 (Nanomaterials, Nanophotonic and Nanoelectronics) group research team at University of Hull,UK.

Research and publications

1- Förster Resonance Energy Transfer and the Local Optical

Density of States in Plasmonic Nanogaps.

https://doi.org/10.1021/acs.jpclett.0c03702

2- Evidence of Nanoparticle Migration in Polymeric Hybrid

Memristor Devices.

https://doi.org/10.1109/ECCTD49232.2020.9218360

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3- Realisation of a sub-wavelength dimple using a 193 nm

wavelength photonic nano jet.

https://doi.org/10.1016/j.cplett.2020.137400

4- Förster Resonance Energy Transfer Rate and Efficiency

in Plasmonic Nanopatch Antennas.

https://chemistryeurope.onlinelibrary.wiley.com/doi/10.1002/cptc.202100285

Conferences and courses attended

Conference Presentations

- The 7th PhD experience Conference 2016 at the University of HullPoster Presentation.
- Nanophotonoics and Micro/Nano Optics International Conference Sep.2017 –Barcelona- Oral presentation.
- The 15th International Conference of Near-field Optics and Nanophotonics (NFO-15)-2018- Poster Presentation.
- Photonics Spectra Conference 2023

Funding and academic awards

2014- The Higher Committee for Education Development in Iraq, University of Hull-UK.

Professional memberships

- Kurdistan Teachers Syndicate.
- Kurdistan Physicist syndicate.
- Nano3 (Nanomaterials, Nanophotonic and Nanoelectronics) group research team at University of Hull,UK.

Professional Social Network Accounts:

- <u>https://www.researchgate.net/profile/Abdullah-Hamza</u>
- <u>https://scholar.google.com/citations?view_op=list_works&hl=en&authuser=1&user=16</u>
 <u>QcnmwAAAAJ</u>
- <u>https://www.linkedin.com/in/abdullah-hamza-38b76ab2/?originalSubdomain=uk</u>

- <u>https://orcid.org/my-orcid?orcid=0000-0003-0220-2418</u>
- <u>https://www.facebook.com/barzan.osman.524</u>

Current research interests My current research interest focuses on enhancing optical properties of the organic and inorganic materials and also controlling Förster resonance energy transfer (FRET) through using plasmonic structures in order to improve their application in wider technology.