

Credentials (IOS Researcher)



ZURAIDA KHUSAIMI

BSc. (Hons.) (University of Aberdeen, Scotland, U.K.)

MSc. Analytical Chemistry and Instrumental Analysis (Universiti Malaya, Malaysia)

PhD (UiTM, Malaysia)

Current roles and responsibilities:

1. Researcher, Centre for Functional Materials & Nanotechnology, Institute of Science
2. Senior Lecturer, Faculty of Applied Sciences

Honors Awards & Showcase:

1. IENA 2009 (Germany), Eureka (Belgium) – 1 Silver & 1 Bronze
2. MTE 2011, PECIPTA 2009 – 2 Silver
3. IIDEX & IID & SRIIC (2009 -2018) – 3 Gold, 3 Silver, 2 Bronze

Selected Journals & Publications

- “Controlled Growth of Zinc Oxide Nanorods by Aqueous-solution Method” , Synthesis and Reactivity in Inorganic, Metal-organic and Nano-Metal Chemistry, Vol. 40 (3), 190 – 194, 2010.
- “ZnO Nanorod Arrays Synthesised Using Ultrasonic-Assisted Sol-Gel and Immersion Methods for Ultraviolet Photoconductive Sensor Applications”, Chapter 5, Nanorods , ISBN 978-953-51-020209-0, InTech, 2012.
- “Hierarchically assembled tin-doped zinc oxide nanorods using low temperature immersion route for low temperature ethanol sensing, Vol 28(21), 16292 - 16305, 2017.
- “Surfactant-free seed-mediated large-scale synthesis of mesoporous TiO₂ nanowires”, Ceramics International, Vol. 41, 4260 - 4266, 2015.
- “ZnO Nanoparticles on Si, Si/Au, and Si/Au/ZnO Substrates by Mist-Atomisation”, Journal of Nanomaterials, Vol. 2012, Article ID 189279, 2012.
- “Novel synthesis of aligned Zinc oxide nanorods on a glass substrate by sonicated sol-gel immersion”, Material Letters, Vol. 64, 1211 – 1214, 2010.

Selected Research Grant

- Improvement on Photoelectrochemical Properties of High Aspect Ratio Titania Nanotubes – **RM 119, 500.00**
- The Synthesis of Graphene From Waste Engine Oil as a Renewable Natural Carbon Source to be Incorporated into Graphene/ZnO Nanocomposite for Sensor Application - **RM 25 000.00**
- Growth of ZnO Nanostructures on TiO₂ Seed Layer for Potential Application of UV Sensor – **RM 20 000.00**
- The Study of Structural and Electrical Properties of ZnO Nanostructures on Porous Silicon as a Gas Sensor – **RM 20 000.00**
- Temperature Dependent Photoluminescence of ZnO Nanorods on Durable Polymer-based Template Prepared by Solution-Immersion Method – **RM 20 000.00**
- Preparation of Hybrid CuO/TiO₂ Photocatalyst Responsive Towards Visible Light – **RM 20 000.00**
- Temperature Dependent Photoluminescence of ZnO Nanorods on Durable Polymer-based Template Prepared by Solution-Immersion Method – **RM 20 000.00**

Research Patent

- “ A Method for Synthesizing Nanostructures”, Zuraida Khusaimi, Suhaidah Amizam, Mohamad Hafiz Mamat, Saifollah Abdullah and Mohamad Rusop, (2010) (Patent No. PI 2010003099)
- “A Method for Preparing Aligned Zinc Oxide (ZnO) Nanorods on Substrate”, Mohamad Hafiz Mamat, Zuraida Khusaimi, Musa Mohamed Zahidi and Mohamad Rusop, (2010) (Patent No. UI 2010004836)
- Synthesis and Characterisation of Nanostructured Zinc Oxide by Sol-gel Mister Atomisation – **RM 15 000.00**