

## Curriculum Vita

---

NAME: Dr. NADYA HUSSIN ALSBANI  
COUNTRY: LIBYA  
NATIONALITY: LIBYAN



### **CONTACT DETAILS:**

E-MAIL: [n.asbani@zu.edu.ly](mailto:n.asbani@zu.edu.ly) and [neam2009@yahoo.com](mailto:neam2009@yahoo.com)  
PH. NO: 0911831203

### **ACADEMIC QUALIFICATIONS:**

- 1. P. h. d. IN CHEMICAL ENGINEERING (2016).**  
DEPARTMENT OF CHEMICAL AND PROCESS ENGINEERING  
THE NATIONAL UNIVERSITY OF MALAYSIA (UKM)  
SELANGOR, MALAYSIA
- 2. M.SC. IN CHEMICAL ENGINEERING (2011).**  
DEPARTMENT OF CHEMICAL AND PROCESS ENGINEERING  
THE NATIONAL UNIVERSITY OF MALAYSIA (UKM)  
SELANGOR, MALAYSIA
- 3. DIPLOMA IN ENGLISH LANGUAGE FOR ACADEMIC PURPOSES.**  
(SIX MONTH), ENGLISH LANGUAGE FACULTY,  
THE NATIONAL UNIVERSITY OF MALAYSIA (UKM)  
SELANGOR, MALAYSIA
- 4. B.SC. IN CHEMICAL ENGINEERING (1998).**  
DEPARTMENT OF CHEMICAL ENGINEERING  
FACULTY OF ENGINEERING/SABRATHA  
ZAWIA UNIVERSITY, LIBYA

### **RECENT JOB & POSITION:**

1. ANALYTICAL TECHNICIAN AT THE NATIONAL CENTER FOR MEDICAL RESEARCH, ZAWIA, 1999-2000.
2. DEMONSTRATOR AT THE ZAWIA UNIVERSITY 2001-2008.
3. MASTER STUDENT AT THE NATIONAL UNIVERSITY OF MALAYSIA (UKM) 2009-2011.
4. P.h.D STUDENT AT THE NATIONAL UNIVERSITY OF MALAYSIA (UKM) 2013-2016
5. LECTURER AT THE FACULTY OF OIL AND GAS AL-ZAWIA UNIVERSITY 2017-2023 FOR:
  - INTRODUCTION OF CHEMICAL ENGINEERING.
  - PETROCHEMICAL INDUSTRY.
  - SEPARATION PROCESSES ENGINEERING.
  - ENGINEERING ECONOMY.

- PHYSICAL CHEMISTRY LAB I.
  - ORGANIC CHEMISTRY LAB.
  - SUPERVISING STUDENTS FOR THEIR RESEARCH PROJECTS INCLUDING WRITING, STRUCTURING AND ANALYSING
6. QUALITY COORDINATOR IN THE CHEMICAL ENGINEERING DEPARTMENT AT THE FACULTY OF OIL, GAS, AND RENEWABLE ENERGY ENGINEERING.
  7. HEAD OF THE CHEMICAL ENGINEERING DEPARTMENT AT THE FACULTY OF OIL, GAS, AND RENEWABLE ENERGY ENGINEERING.

### **EXTERNAL ACTIVITIES**

- Participating in amending the Department of Chemical Engineering guide at the Faculty of Oil, Gas, and Renewable Energy Engineering.
- Preparing the study plan for the Department of Chemical Engineering at the Faculty of Oil, Gas, and Renewable Energy Engineering.

### **RESEARCH EXPERIES:**

- BIOLOGICAL WATER AND WASTEWATER TREATMENT
- ENVIRONMENTAL MICROBIOLOGY.
- WASTEWATER TREATMENT PROCESS
- PHYTOREMEDIATION
- EDUCATION ENGINEERING
- STATICAL ANALYSIS

### **WORKSHOPS:**

- 1) MATLAB: A COMPREHENSIVE REFERENCE ENGINEERS (2009)
- 2) BASIC SPSS SKILL WORKSHOP (2014).
- 3) WORKSHOP ON SPSS STATISTICS (2014).
- 4) SOCRATIC QUESTIONING IN ANALYSING LITERATURE WORKSHOP (2014)
- 5) WORKSHOP ON BASIC LITERATURE REVIEW (2014)
- 6) HOW TO GET PUBLISHED WITH SPRINGER. (2014)
- 7) SPSS INTERMEDIATE LEVEL (2015)

### **PUBLICATION:**

#### ❖ **RESEARCH PAPERS:**

- 1) **Nadya, Hussin Al Sbani**, Siti Rozaimah, S.A., Nur 'Izzati I., Omar H.J. (2014), Preliminary Test of Hydrocarbon Exposure on *Eleocharis Ochrostachys* in Phytoremediation Process. Aust. J. Basic & Appl. Sci., 8(19): 26-29,
- 2) Omar Hamed Jehawi, Siti Rozaimah Sheikh Abdullah, Hassimi Abu Hasan, Nurina, Anuar, Mushrifah Idris, **Nadya Hussin Al Sbani**, Nur 'Izzati Ismail (2014), A Reed Bed System For The Treatment Of Domestic Wastewater and Micropollutants. Aust. J. Basic & Appl. Sci., 8(19): 280-283.
- 3) 'Izzati, I. Nur; Siti Rozaimah, S. A.; Mushrifah, I.; **Nadya, Hussin. Al Sbani.**; Omar, H. J. (2014). Preliminary Test of Mining Wastewater Containing Iron (III) and Aluminium (III) on *Lepironia articulata* in Phytoremediation, Australian Journal of Basic & Applied Sciences; Special, Vol. 8 Issue 19, p168

- 4) O. H. Jehawi, S. R. Sheikh Abdullah, M. Idris, H. Abu Hasan, **Nadya Hussin. Al Sbania**, N. I. Ismail, (2015). "Removal of Chemical Oxygen Demand (COD) from Domestic Wastewater Using Hybrid Reed Bed System", Applied Mechanics and Materials, Vols. 773-774, pp. 1226-1230, 2015
- 5) **Nadya Hussin Al Sbania**; Siti Rozaimah Sheikh Abdullaha; Idris, Mushrifah; Jehawi, Omar Hamed ; Ismail, Nur 'Izzati, (2015). Preliminary Test of Hydrocarbon Exposure on *Lepironia articulata* in Phytoremediation Process. Applied Mechanics & Materials. Vol. 773-774, p1121-1126. 6p.
- 6) N. I. Ismail, S. R. Sheikh Abdullah, M. Idris, H. Abu Hasan, **Nadya Hussin Al Sbani**, O. H. Jehawi, (2015). "Preliminary Test of Mining Wastewater Containing Iron (III) and Aluminium (III) on *Scirpus grossus* in Phytoremediation Process", Applied Mechanics and Materials, Vols. 773-774, pp. 1111-1115.
- 7) Ismail, Nur Izzati; Abdullah, Siti Rozaimah Sheikh; Idris, Mushrifah; Hasan, Hassimi Abu; **Al Sbani, Nadya Hussin**; Jehawi, Omar Hamed (2015). Tolerance and Survival of *Scirpus grossus* and *Lepironia articulata* in Synthetic Mining Wastewater, Journal of Environmental Science and Technology 8.5 : 232-237.
- 8) **Nadya Hussin Al-Sbani**, Siti Rozaimah Sheikh Abdullah, Mushrifah Idris, Hassimi Abu Hasan, Omar Hamed Jehawi, Nur'Izzati Ismail. (2016). Toxicity test of Hydrocarbon Exposure on *Lepironia articulata* in phytoremediation process. *Asian Journal of Chemistry* 28(1):30-34.
- 9) Ismail Nur 'Izzati, Sheikh Abdullah Siti Rozaimah, Idris Mushrifah, Abu Hasan Hassimi, Halmi Mohd Izuan Effendi, **Hussin AL Sbani Nadya**, Hamed Jehawi Omar, Sanusi Salmi Nur Ain, and Hashim Mohd Hafifi (2016). Accumulation of Fe-Al by *Scirpus grossus* Grown in Synthetic Bauxite Mining Wastewater and Identification of Resistant Rhizobacteria, Environmental Engineering Science. doi:10.1089/ees.2016.0290.
- 10) **Nadya Hussin Al-Sbani**, Siti Rozaimah Sheikh Abdullah, Mushrifah Idris, Hassimi Abu Hasan, Omar Hamed Jehawi, Nur'Izzati Ismail (2016). Sub-surface flow system for PAHs removal in water using *Lepironia articulata* under greenhouse conditions, Ecological Engineering, Volume 87, Pages 1–8
- 11) Nur 'Izzati Ismaila, Siti Rozaimah Sheikh Abdullaha, Mushrifah Idrisb, Hassimi Abu Hasana, Mohd Izuan Effendi Halmic, **Nadya Hussin Al Sbanid**, Omar Hamed Jehawia (2019). Simultaneous bioaccumulation and translocation of iron and aluminium from mining wastewater by *Scirpus grossus*, Desalination and Water Treatment, 163 (2019): 133–142.
- 12) **Nadya AL-Sbania**, Omar Jehawia (2019) The Ability of *L. Articulata* to Remove Polycyclic Aromatic Hydrocarbons (PAHs) from Diesel Contaminated Water in Horizontal Pilot Constructed Wetlands (HCWs) Reactors, 2nd Conference for Engineering Sciences and Technology - CEST2 29-31- Sabratha –Libya.
- 13) Omar Hamed Jehawi, Siti Rozaimah Sheikh Abdullah, Hassimi Abu Hasan, **Nadya Hussin Al Sbani**, Nur 'Izzati Ismail (2019). Kinetic of on Nutrient Removal in Low-Strength Domestic Wastewater Under Continuous Operation of Pilot Scale of Hybrid Read Bed System (SF-VF-HF), journal of engineering and application of science, 14(5): 9154-9161.
- 14) **Nadya Hussin AL Sbani**, Siti Rozaimah Sheikh Abdullah, Mushrifah Idris, Hassimi Abu Hasan, Israa Abdulwahab Al-Baldawi, Omar Hamed Jehawi, Nur 'Izzati Ismail, (2020) Remediation of PAHs-contaminated Water and Sand by Tropical Plant (*Eleocharis*

- Ochrostachys*) Through Sub-Surface Flow System. Environmental Technology & Innovation, 20:1-10.
- 15) Omar Hamed Jehawi, Siti Rozaimah Sheikh Abdullah, Setyo Budi Kurniawan, Nur 'Izzati Ismail, Mushrifah Idris, **Nadya Hussin Al Sbani**, Mohd Hafizuddin Muhamad, Hassimi Abu Hasan, (2020). Performance of pilot Hybrid Reed Bed Constructed Wetland with Aeration System On Nutrient Removal for Domestic Wastewater Treatment, 19:1-9.
- 16) Nur 'Izzati Ismail, Siti Rozaimah Sheikh Abdullah, Mushrifah Idris, Setyo Budi Kurniawan, Mohd Izuan Effendi Halmi, **Nadya Hussin AL Sbani**, Omar Hamed Jehawi, Hassimi Abu Hasan, (2020). Applying Rhizobacteria Consortium for The Enhancement of *Scirpus Grossus* Growth and Phytoaccumulation of Fe and Al in Pilot Constructed Wetlands, Journal of Environmental Management, 267:1-13.
- 17) Siti Rozaimah Sheikh Abdullah, Israa Abdulwahab Al-Baldawi, Asia Fadhile Almansoori, Ipung Fitri Purwanti, **Nadya Hussin Al-Sbani**, Siti Shilatul Najwa Sharuddin. (2020). Plant-assisted remediation of hydrocarbons in water and soil: Application, mechanisms, challenges and opportunities, review paper, chemosphere, 247 (125932): 1-19.
- 18) عمر سلطان، محمد قباصة، نادية السباني، (2020). تقييم وتحليل جودة أنواع زيوت تزييت محركات البنزين المتداولة في الأسواق الليبية، لمجلة الجامعة – العدد الثاني والعشرون- المجلد الأول، 49-60.
- 19) أ.محمد عبد المجيد قباصة، د.نادية حسين السباني، د.عمر محمد سلطان، (2020). تحليل الخواص الكيميائية والبيولوجية لتقييم جودة مياه الشرب المعبأة في مدينة طرابلس- ليبيا، المجلة الجامعة – العدد الثاني والعشرون- المجلد الثالث، 1-20.
- 20) نادية حسين السباني. 2022. دراسة إمكانية استخدام تقنية المرشح الرملي الحيوي (البيولوجي) في معالجة مياه الصرف الصحي لري المساحات الخضراء. المجلة الدولية للعلوم والتقنية. العدد 30.

### **CONFERENCES:**

- 1) INTERNATIONAL CONFERENCE ON CHEMICAL ENGINEERING & INDUSTRIAL BIOTECHNOLOGY (ICCEIB 2013), UMP UNIVERSITY, KUANTAN, MALAYSIA.
- 2) THE INTERNATIONAL CONFERENCE ON ENGINEERING AND DUILT ENVIRONMENT (ICEBE) 2013, UKM UNIVERSITY, SELANGOR, MALAYSIA.
- 3) INTERNATIONAL INTEGRATED ENGINEERING SUMMIT 2014 (IIES 2014), UNIVERSITY TUN HUSSEIN ONN MALAYSIA, JOHOR, MALAYSIA.
- 4) 28th SYMPOSIUM OF MALYSIA CHEMICAL ENGINEERING (SOMCHE 2015).
- 5) 2ND CONFERENCE FOR ENGINEERING SCIENCES AND TECHNOLOGY 2019 (CEST2 29-31 2019) SABRATHA –LIBYA.

### **SUPERVISED PROJECTS**

<b>No.</b>	<b>Title</b>	<b>year</b>	<b>B.Sc/ master</b>	<b>Notes</b>
1.	WASTE WATER TREATMENT USING BIO SAND FILTER	2019-2021	B.Sc in chemical engineering	-
2.	BIOGAS PRODUCTION FROM CHICKEN MANURE	2021-2022	B.Sc in chemical engineering	-
3.	BIOGAS PRODUCTION FROM COW MANURE	2021- 2022	B.Sc in chemical engineering	-
4.	CHEMICAL PERFORMANCE EVALUATION FOR SOURCED LOCALLY CORROSION INHIBITOR TREATMENT IN CRUDE UNIT AT SARIR OIL REFINERY	2021-2022	B.Sc in chemical engineering	-
5.	EXTRACTION AND CHARACTERIZATION OF BIODIESEL FROM CASTOR PLANT AS ALTERNATIVE FUEL FOR DIESEL ENGINE.	2022-2023	Master in Chemical Engineering	-
6.	USING AN ACTIVE CARBON TO DISINFECT SULFIDE-RICH WATER IN LIBYA'S WESTERN REGIONS	2022-2023	B.Sc in chemical engineering	-
7.	EXTRACTION AND CHARACTERIZATION OF BIODIESEL FROM CASTOR PLANT AS ALTERNATIVE FUEL FOR DIESEL ENGINE.	2022-2023	B.Sc in chemical engineering	-
8.	OPTIMIZATION OF ANAEROBIC CO-DIGESTION OF FOOD WASTE TO PRODUCE BIOGAS	2022-2023	Master in Chemical Engineering	-
9.	COMPARISON OF CATALYSTS' PERFORMANCE ON TRANSESTERIFICATION OF CASTOR OIL FOR BIODIESEL PRODUCTION	2022-2023	Master in Chemical Engineering	Under Process
10.	STUDY THE EFFECT OF THE TEMPERATURE ON THE TRANSESTERIFICATION OF CASTOR OIL TO PRODUCE BIODIESEL	2022-2023	B.Sc in chemical engineering	Under Process
11.	THE OPTIMIZATION OF THE PYROLYSIS PROCESS OF CREATING BIOFUEL FROM WASTE PLASTIC	2022-2023	B.Sc in chemical engineering	Under Process

### **REFERENCES:**

- 1) Prof. Ir. Dr. Siti Rozaimah Sheikh Abdullah  
Head of Department (chemical and process Engineering)  
603-8921 6407  
rozaimah@ukm.edu.my  
MEng (Nottingham), PhD (UKM)  
Water and Wastewater Treatment Technology;  
Environmental Microbiology; Phytoremediation  
UKM Experts