## Dr. Nabeel M. Gazzaz

### Ph.D (w/Honors) in Environmental Analysis and Modeling

### (Academic Rank: Assistant Professor)

NabeelMGazzaz@outlook.com

(00 962) 78 079 089 1

## **PERSONAL DETAILS**

Year of Birth: 1970

Place of Birth: Amman, Jordan

Nationality: Jordanian

## **EDUCATION**

#### PhD

Date: February 2012
Degree: Doctor of Philosophy
Specialization: Environmental Analysis and Modeling
Organization: Universiti Putra Malaysia (UPM)
Location: Kuala Lumpur, MALAYSIA.
CGPA<sup>1</sup>: 3.82/4.00
Rating: Excellent
Dissertation Title: Artificial Neural Network for Water Quality Assessment and Land Use Pattern Recognition in Kinta River Catchment

### MSc

Date: August 1999
Degree: Master of Science
Specialization: Environmental Sciences and Management
Organization: University of Jordan
Location: Amman, JORDAN
CGPA<sup>1</sup>: 3.58/4.00
Rating: Very Good
Thesis Title: Investigation of the Long-term Effects of Treated Domestic Wastewater Irrigation on Soil
Chemistry and Olive (*Olea Europea*, L.) Yield and Quality

### BSc

Date: January 1993 Degree: Bachelor of Science Specialization: Chemistry (Major); Environmental Sciences (Minor) Organization: Yarmouk University Location: Irbed, JORDAN CA<sup>2</sup>: 72.3% Rating: Good

### **KNOWLEDGE DOMAIN**

The Higher Education Accreditation Committee (HEAC) of Jordan has characterized, accredited, and licensed the knowledge domain of Dr. Nabeel M. Gazzaz to be the following specializations:

## (I) Environmental Analysis and Modeling (II) Analytical Chemistry (III) Water and Environment

### **EXPERIENCE**

#### 2019-

Job Title: Faculty Member Academic Rank: Assistant Professor Employment Basis: Full-time, Joint Appointment Organization: Jerash (Private) University Faculty: Faculty of Agriculture and Science

<sup>&</sup>lt;sup>1</sup> CGPA: Cumulative Grade Point Average

<sup>&</sup>lt;sup>2</sup> CA: Cumulative Average

Department 1: Department of Natural Sciences (Chemistry)
 Department 2: Department of Agricultural Sciences (Climate Change and Sustainable Agriculture)
 Address: Jerash, JORDAN
 Job Responsibilities: Teaching of graduate and undergraduate courses in chemistry, environmental

sciences, climate change, Remote Sensing, and Geographic Information System.

#### 2013-

Job Title: Scientific Researcher and Consultant. Employment Basis: Part-time (Freelancer) Organization (1): Al-Najdawi Center for Translation and Research Organization (2): Motoon Center for Training and Consultation Address: Amman, JORDAN Job Responsibilities: Translation; Text editing (Proof-reading); Qualitative statistical analysis; Quantitative statistical analysis; Scientific reviewing and evaluation; Design of research models for master's theses and doctoral dissertations; Design and preparation of the research tools for master's theses, doctoral dissertations, and scientific papers (journal articles and conference papers).

#### 2007-2012

Studying for the PhD degree

#### 2000-2006

Job Title: Teaching and Research Assistant Employment Basis: Full-time Department: Management of Land and the Environment Faculty: Natural Resources and the Environment Organization: The Hashemite University Address: Zarqa, JORDAN

#### 1996-1999

Studying for the Master's degree

#### 1996-1997

Job Title: Teaching Assistant Employment Basis: Full-time Department: Chemistry Faculty: Natural Sciences Organization: The University of Jordan Address: Amman, JORDAN

#### 1993-1996

Job Title: Laboratory Technician Employment Basis: Full-time Department: Pharmacy Faculty: Allied Medical Sciences Organization: Al Israa' (Private) University Address: Amman, JORDAN)

#### **PROFESSIONAL ACTIVITIES**

#### **Professional Training Courses:**

- 1. Physical and Chemical Analysis of Water and Wastewater.
- 2. Quality Control Charts in the Chemical Analysis Laboratories.
- 3. Higher Education Teaching and Evaluation Technology.

### Workshops Attended:

- 1. Use of Membrane Reverse Osmosis Technology in Treatment of Water and Wastewater.
- 2. Gray water: Current Status and Future Perspective.
- 3. Quality of Drinking Water in Jordan: Scientific Facts.
- 4. The National Project for Monitoring Water Quality in Jordan.
- 5. Urban Wastewater Treatment and Reuse Technologies (Organized by the MEDAWARE Project).

6. The Efficient Use of the Services and Databases of the Aggregated, Online, Electronic Publications

(EBSCOhost, Emerald, ProQuest, RefWorks, ScienceDirect, SciFinder, Scopus, and Wiley Interscience).

## (I) English Language Skills

TOEFL (17 July 2003). Total Test Score: 270/300 Computer-Based Test (CBT) = 637/667 Paper-Based Test (PBT): Listening: 27/30 Reading: 27/30 Structure/Writing: 27/30 Essay Writing: 5.0/6.0

### (II) IT Skills

International Computer Driving License (ICDL) Adobe Photoshop Programming Using Visual Basic PC Maintenance and Trouble Shooting Data Manipulation and Statistical Analysis Using the SPSS Package

(III) Other Skills. I possess good knowledge and experience dealing with:

### 1- Artificial neural network software<sup>3</sup>

Attrasoft Predictor	NeuralWorks Professonal II/Plus	NuMap
Auto2Fit	Neuralyst	SPSS
Forecaster	NeuroIntelligence	StatGraphics Centurion
NeuralPower	NuClass	StatSoft STATISTICA

2. Machine learning software<sup>4</sup> (SVMLight and StatSoft STATISTICA)

### 3. Data manipulation and statistical analysis software

AMOS	MedCalc	SAS
EViews	Minitab	SPSS
GraphPad Prism	MPlus	StatGraphics Centurion
JMP	NVivo	StatSoft STATISTICA
		Systat SigmaPlot

# 4. Computerized chemical models for equilibrium calculations in natural systems

**Soil:** SOILCHEM **Water:**<sup>5</sup> MINEQ, PHREEQC, MINTEQA2, PCWATEQ, and MINEQL+

### 5. Remote Sensing (RS): Exelis ENVI.

6. Geographic Information Systems (GIS): ArcGIS, Global Mapper, and MapInfo.

### HOBBIES

Reading; Jogging; Playing chess.

### **PUBLICATIONS**

### Main Author:

1: Gazzaz, N.M., Kamil, M., Firuz, M., Zaharin, A., and Juahir, H. 2012. Characterization of spatial patterns in river water quality using chemometric pattern recognition techniques. Marine Pollution Bulletin 64 (4): 688-698 (Impact Factor (IF): 2.359)

\*\*\* This article has been identified by Earth Emphasis (Center for Top Earth and Environmental Science Research) as being of special interest to the progress in the Earth Sciences field. Earth Emphasis alerts the scientific community to breaking journal articles considered to represent the best in Earth Science and Environmental Studies research.

<sup>&</sup>lt;sup>3</sup> The Multi-Layer Perceptron (MLP); Radial Basis Function (RBF) Neural Networks; Probabilistic Neural Networks (PNN); Generalized Regression Neural Networks (GRNN); and the Self-Organizing Feature Maps (also known as Kohonen Self-Organizing Maps)

<sup>&</sup>lt;sup>4</sup> Support Vector Machines (SVM); Naïve Bayes Classifiers, and the k-Nearest Neighbor Classifier.

<sup>&</sup>lt;sup>5</sup> Ocean, river, lake, ground, and rainfall water, besides low-temperature hydrothermal water.

\*\*\* In 2012, this article was categorized and ranked as one of 20 articles contributing to advancement in human knowledge and research in the Earth and Environmental Science field.

- 2: Gazzaz, N.M., Kamil, M., Zaharin, A., Juahir, H., and Firuz, M. 2012. Artificial neural network modeling of the water quality index for Kinta River (Malaysia) using water quality variables as predictors. Marine Pollution Bulletin 64 (11): 2409-2420. (IF: 2.359)
- 3: Gazzaz, N.M., Kamil, M., Hafizan, J., Firuz, M., and Zaharin, A. 2013. Water quality assessment and analysis of spatial patterns and temporal trends. Water Environment Research 85 (8): 751-767. (IF: 0.890).
- **4:** Gazzaz, N.M., Kamil, M., Juahir, H., Firuz, M., and Zaharin, A. 2015. Artificial neural network modeling of the water quality index using land use areas as predictors. Water Environment Research 82 (2): 99-112 (IF: 1.134)

\*\*\*This model is the first ever of its kind in human history\*\*\*

### **Co-Author:**

 Al-Shatnawi, A.M., El-Bashir, M.S., Bani Khalaf, R.M., and Gazzaz, N.M. (2015). Vulnerability mapping of groundwater aquifer using SINTACS in Wadi Al-Waleh catchment, Jordan. Arabian Journal of Geosciences, 9 (1): 1-13 (IF: 1.22)

#### REFERENCES

### 1- Prof. Dato' Nikmat Muhamad bin Nik Abd. Majid

Faculty of Forestry; Universiti Putra Malaysia (UPM) E-mail: <u>nik@forr.upm.edu.my</u> Office Phone: (+60) 3 8946 7211 Mobile Phone: (+60) 122365996

## 2- Associate Prof. Mohd Kamil Yusoff

Director of Center for Professional Environmental Services; Faculty of Environmental Studies; UPM E-mail: <a href="mailto:mkamil@env.upm.edu.my">mkamil@env.upm.edu.my</a> Office Phone: (+60) 3 8946 6122/4 Mobile Phone: (+60) 12 2326102

## 3- Associate Prof. Mohammad Firuz Ramli

Director of the Environmental Sciences Graduate Program; Faculty of Environmental Studies; UPM E-mail: <u>firuz@env.upm.edu.my</u> Office Phone: (+60) 3 8946 6753/6745 Mobile Phone: (+60) 16 2220607

## 4- Prof. Taleb M. Abu-Sharar

Department of Land, Water, and Environment; Faculty of Agriculture; The University of Jordan. E-mail: <u>t.m.abu-sharar@ju.edu.jo</u> Office Phone: (+962) 6 5355000 (Ext. 22454) Mobile Phone: (+962) 79 5740855

### 5. Prof. Ali. R. El-Naqa

Water and Environment Management; Faculty of Natural Resources and the Environment; The Hashemite University **E-mail**: <u>elnaqa@hu.edu.jo</u>

**Office Phone**: (+962) 5 3903333 (Ext. 4231) **Mobile Phone**: (+962) 79 9047033

## 6. Associate Prof. Mohammad I. Qinna

Land and Environment Management; Faculty of Natural Resources and the Environment; The Hashemite University E-mail: <u>ginna@hu.edu.jo</u> Office Phone: (+962) 5 3903333 (Ext. 5122) Mobile Phone: (+962) 79 6700222

## 7. Assistant Prof. Mohammad S. Al Basheer

Department of Computer Science; Prince Hussein Faculty of Information Technology; Al Al-Bayt University E-mail: mohdelb@aabu.edu.jo

**Office Phone:** (+962) 2 6297000 **Mobile Phone:** (+962) 79 7827686

# 8. Khaled Saeed Al-Najdawi

Director of Al-Nagdawi Center for Translation and Research Mobile Phone: (+962) 78 0026288 ; (+962) 78 0120858 E-mail: alnoor1433@outlook.com

## 9. Mahmood Khaleefah

Director of Motoon Center for Training and Consultation **Mobile Phone**: (+962) 79 0200281; (+962) 79 2810080 **E-mail**: khalifehmahmoud@yahoo.com, <u>fastservicesjo@gmail.com</u>