

DR. MOHAMED ZAROUAN*Assistant-Professor, Electrical and Computer Engineering Dep., King Abdulaziz University***Education**

<i>Degree</i>	<i>Field</i>	<i>Institution</i>	<i>Year</i>
PhD	Electrical Engineering	ENIT, Tunis, Tunisia	2007
MS	Electrical Engineering	Tunis University, Tunisia	1999
BS	Electrical Engineering	ENIT, Tunis, Tunisia	1997

Academic Experience

<i>From</i>	<i>To</i>	<i>Institution</i>	<i>Rank</i>	<i>Title (Chair, Coordinator, etc.)</i>	<i>Full or Part Time</i>
2004	2007	Tunis El Manar Univ., Tunisia	Lecturer		Full Time
2007	2012	Tunis El Manar Univ., Tunisia	Assis. Prof.		Full Time
2012	2017	King Abdulaziz University	Assis. Prof.	EE366 Coordinator	Full Time
2017	2019	King Abdulaziz University	Assis. Prof.	EE361 Coordinator	Full Time
2019	NOW	King Abdulaziz University	Assis. Prof.	EE300 Coordinator	Full Time

Non Academic Industrial Experience (including Consultations)

<i>From</i>	<i>To</i>	<i>Company/Entity</i>	<i>Title</i>	<i>Position Description (Brief)</i>	<i>Full or Part Time</i>
1999	2000	Sectoral Center of Training in Electronics of Tunis, Tunisia	Trainer	Electrical Engineering Instructor	Full Time
2000	2001	Higher Institute of Technological Studies of Rades, Tunisia	Technologist Assistant	Electrical Engineering Instructor	Full Time
2001	2004	Higher Institute of Technological Studies of Rades, Tunisia	Technologist	Electrical Engineering Instructor	Full Time

Current Research Interests

- Digital and analogue circuit design
- Real time and embedded control
- Control systems and Robotics
- Complex behaviour of nonlinear systems
- Fractal Modelling
- Simulation
- Optimization

Certifications and Professional Registrations

Registered Professional Engineer in Tunisia

Current Membership in Professional Societies and Organizations

<i>Society/organization</i>	<i>Rank</i>	<i>Member Since</i>
1. Association of Specialists Electricians in Tunisia	Member	2004
2. Tunisian Syndicate of Higher Education and Scientific Research	Member	2000
3. Order of the Tunisian Engineers	Member	1997
4. Association of young science of Tunisia	Member	1990

Honours and Awards

Ranked first among 10 BS graduates from the Electrical Engineering department, National Engineering Institute of Tunis, Tunis El Manar University, Tunisia, 1997.

Institutional and Professional Services (administration, committees, units, etc.)

1. Manager of Final Projects, Electrical Engineering Department, High Institute of Medical Technologies of Tunis, Tunis El Manar University, 2011 and 2012.
2. Member of Scientific Council, High Institute of Medical Technologies of Tunis, Tunis El Manar University, 2012

3. Member of Master Committee of a Professional Master “Embedded Systems”, Electrical Engineering Department, High Institute of Medical Technologies of Tunis, Tunis El Manar University, 2010, 2011, and 2012.
4. Member of TAFT Committee emanated from the ABET Committee of the Electrical and Computer Engineering Department, in Faculty of Engineering of King Abdulaziz University of Jeddah.

Principal Publications/Presentations from the Past ten Years

1. M. Zarouan, J.Y. Dieulot, and M. Benrejeb, “On the uniqueness of the response of faulted electric-power transmission lines”, *Electronic Journal of Science and Technology of Automatic, Revue e-STA*, vol. n° 3, 6 pages, 2006.
2. M. Zarouan, R. Ben Mahmoud, J.Y. Dieulot, and M. Benrejeb, “On the uniqueness of the response of coupled systems. Faulted electric-power transmission lines case”, *International Multi-Conference on Systems, Signals & Devices, SSD’2007, Hammamet*, 19-22 march 2007.
3. R. Ben Mahmoud, M. Zarouan, and M. Benrejeb, “Limitation of the harmonic balance. Case of an electric-power transmission lines having a non-linear inductance”, *JTEA’2008, Hammamet*, Mai 2008.
4. S. Allali, M. Zarouan, and M. Benrejeb, “Fuzzy modelling of chaotic logistic map”, *JTEA’2008, Hammamet*, Mai 2008.
5. M. Zarouan, S. Allali, and M. Benrejeb, “Correlation between the bifurcation diagram structure and the predominant harmonics of an electric-power transmission lines response”, *Chaos, Solitons & Fractals*, vol. 41, n°1, pp. 615-623, 2009.
6. L. Ladhar, M. Zarouan, H. Rmili, and D. Oueslati, “Numerical analysis of a Cellular-Automata Irregular-Fractal wideband antenna”, *Mediterranean Microwave Symposium, MMS 2013., Saida, Lebanon*; 09/2013.
7. L. Ladhar, M. Zarouan, D. Oueslati, J.-M. Floch, and H. Rmili. "Investigation on cellular-automata irregular-fractal ultrawideband slot-antennas." *Microwave and Optical Technology Letters* 57, no. 11 (2015): 2506-2514.
8. A. M. Rushdi, M. Zarouan, T. M. Alshehri, and M. A. Rushdi. "A Modern Syllogistic Method in Intuitionistic Fuzzy Logic with Realistic Tautology." *The Scientific World Journal*, Volume 2015 (2015), 12 pages.
9. A. M. Rushdi, M. Zarouan, T. M. Alshehri, and M. A. Rushdi. "The incremental version of the modern syllogistic method." *Journal of King Abdulaziz University: Engineering Sciences* 26, no. 2. pp. 25-51 (2015).
10. A. M. Rushdi, T. M. Alshehri, M. Zarouan, and M. Ali Rushdi. "Utilization of the modern syllogistic method in the exploration of hidden aspects in engineering ethical dilemmas". *Journal of King Abdulaziz University: Computers and Information Technology*, Volume 2, no. 2, 2015.
11. M. Zarouan. "Ferroresonance Suppression by Reinforcing the Capacitance of a Transmission Line". *Life Science Journal* 2017; 14(8): 73-80.
12. A. M. Rushdi, M. A. Rushdi, M. Zarouan, and W. Ahmad. "Satisfiability in intuitionistic fuzzy logic with realistic tautology" *Kuwait Journal of Science*, April 2018.

Recent Professional Development Activities (*Workshops, training, etc.*)

ABET Program Assessment Workshop, with Dr. A. Khatawina, King Abdulaziz University, Jeddah, Saudi Arabia, Oct. 2012.

ABET Program Assessment Workshops, with Dr. A. Ahmad Balamash, King Abdulaziz University, Jeddah, Saudi Arabia, from 2014 to 2019