

Ahmad A. Al-Daraiseh

2350 Broadhollow Rd /ECT Dpt

Farmingdale, NY, 11735

Office Phone (631) 420-2589

Cell Phone (347) 998-0787

E-mail: creepymaster@gmail.com or ahmad.al-daraiseh@farmingdale.edu

Curriculum Vitae

EDUCATION

2002 – 2006 **Ph.D.** Computer Engineering- Software Engineering, March 2006.

University of Central Florida, Orlando, Florida.

Graduated with distinction (G.P.A 3.92/4.00).

Dissertation Title: “Genetically Engineered Adaptive Resonance Theory ART Neural Networks”.

1999-2001 **M.S.** Computer Engineering- Software Engineering, May 2001.

University of Central Florida, Orlando, Florida.

Graduated with distinction (G.P.A. 3.9/4.00).

Thesis Title: “Verification of real-time software in ground transportation systems”

1993-1998 **B.S.** Electrical Engineering, January 1998

Yarmouk University, Jordan.

Graduated with high honors (G.P.A. 3.1/4.00).

Graduation Projects:

- Design and implementation of an electrical balance
- Design and implementation of a wireless remote-controlled DC motor

IMIGARATION STATUS

Green Card holder

Honors, Fellowships, Scholarships, and Awards at Graduate and Undergraduate Schools

- CATSS Scholarship, University of Central Florida, 2000.
- Honour list, Yarmouk University, 1995 and 1996
- Awarded for ranking number one in playing chess, Yarmouk University, 1994.

TEACHING & RESEARCH EXPERIENCE

9/2009 – Current

Computer Engineering Faculty at Farmingdale State College

A faculty member in the Electrical & Computer Engineering Department.

Taught the following courses:

- Digital Design and Lab
- DC Circuits

9/2006 – 9/2009

Computer Engineering Faculty at the Hashemite University

A faculty member in the Computer Engineering Department.

Taught the following courses:

- C++ Programming
- Object Oriented Programming
- Discrete Math (Computer Engineering Foundations)
- Microprocessors
- Assembly and Microcomputers
- Computer Architecture
- Neural Networks
- Circuits Lab

During this period I supervised two graduation projects, one was chosen to be one of the best projects in School of Engineering (Voice Controlled Home Automation). I'm also a member of many committees such as ABET, college counsel and many others.

5/2006 – 8/2006

Computer Engineering Faculty at the University of central Florida

Taught a Numerical Analysis class

2000 - 9/2006

Expert Systems Engineer, Power Diagnostics R&D Group, Siemens PG

Developed research proposals and managed projects in the diagnostics field. Developed design plans real time monitoring of power plants.

1999 - 5/2006

Graduate Student Researcher
School of Electrical and Computer Science
University of Central Florida, Orlando

Worked on several research projects in the areas of Machine Learning, Neural Networks, Genetic Algorithms, Software Verification, Tank Simulation, Modeling Movement of Heavy Trucks at Seaports using Neural Networks, and others.

1997-1998

Lab Engineer
Department of Electrical Engineering, Yarmouk University, Jordan

Taught electronics labs, and managed the EE department's computer lab.

INDUSTRIAL EXPERIENCE

May 2000 – 9/2006

Expert Systems Engineer, Siemens PG, Orlando, FL
Research Engineer, Knowledge Based Systems Engineer, Web Page Designer, GT Diagnostics Engineer, C++ Programmer, Artificial Intelligence and Neural Networks Expert.

- Smart rules and operators for the PDS expert system, which diagnose the Gas and Steam turbines and generators in the power plants
- Power Diagnostics (PD) Web Page design and development
- C++ tools designing, coding, testing and integration. made easy and automated most of the tasks for the group
- Neural Network Models for diagnostic purposes
- Research new methods to improve the speed and the efficiency of the diagnostics findings

Oct 1999 – May 2001

Research Assistant, Institute for Simulation and Training
Orlando, FL

- Tank simulation program, using the ObjecTime software, which uses C++, UML, and java , on a Unix network

1998 – 1999

Electrical Engineer, Royal Scientific Society Amman, Jordan

- Performed electrical, electronic parts and physical instruments calibration
- Performed electrical devices check against Jordanian standards
- Developed Easier and more effective testing procedures
- Received ISO certificate and Internal Auditing Training

1996 - 1996

**Electrical/Computer Engineer, Royal Jordanian
Amman, Jordan**

- Computer hardware and software engineer. (training)

RESEARCH INTERESTS

Developing optimal or sub-optimal Neural Networks, Genetic Algorithms, Computer Vision and Robotics.

PUBLICATIONS

Refereed Journal Publications

Klodzinski, J. Al-Daraiseh, A., Georgiopoulos, M., and AL-DEEK, H., “*Development of a Java Applet for Generating Trucks from Freight Data,*” Journal of the Transportation Research Board, No. 1870, pp. 10-17, October 2004.

A. Al-Daraiseh, M. Georgiopoulos, G. Anagnostopoulos, A. S. Wu, M. Mollaghasemi., “*GFAM: Evolving Fuzzy ARTMAP Neural Networks*“, Journal of Neural Networks, Vol. 20, No. 8, pp 874-892, 2007.

Book Chapters

A. A. Al-Daraiseh, A. Kaylani, M. Georgiopoulos, M. Mollaghasemi, A. S. Wu, G. Anagnostopoulos, “Genetically Engineered ART Architectures”, in Computational Intelligence Based on Lattice Theory, Studies in Computational Intelligence, 67, Editors: V. G. Kaburlasos and G. X. Ritter, Springer Verlag, August 2007, pp. 233-262.

Refereed International Presentations

Klodzinski, J., Al-Daraiseh, A., Georgiopoulos, M., and Al-Deek, H., “Development of a Java Applet for Generating Trucks from Freight Data,” presented at the *Transportation Research Board 83rd Annual Meeting*, Washington D.C., January 11-15, 2004.

Conference Proceedings

1. A. Al-Daraiseh, J. Zalewski, H. Toetenel “*Expressing and Verifying Timing Requirements with UML*” SCI2001 5th World Multi-Conference on Systemics, Cybernetics and Informatics Orlando, FL, July 22-25, 2001, Vol. XI, pp. 461-466
2. A. Al-Daraiseh, J. Zalewski, H. Toetenel “*Software Verification in Ground Transportation Systems*” SCI2001 5th World Multi-Conference on Systemics, Cybernetics and Informatics Orlando, FL, July 22-25, 2001, Vol. XVII (Part 2), pp. 271-276.
3. A. Al-Daraiseh, A. Al Mazid, T. Croeze, J. Zalewski, M. Dolezal, G. Green, H. Bahr “*High-Level Tool Support for Integration Architecture in a Distributed Embedded Simulation Project*”, CSMA2000, 2nd Conference on Simulation Methods and Applications, Orlando, Florida, October 27-29, 2000, pp. 33-36
4. Ahmad Al-Daraiseh, Michael Georgiopoulos, Annie S. Wu, Georgios Anagnostopoulos, and Mansooreh Mollaghasemi (2006). GFAM: Evolving fuzzy ARTMAP neural networks. In the *Proceedings of the 19th International Florida Artificial Intelligence Research Society (FLAIRS) Conference*, Melbourne Beach, FL, May 11-13, 2006.
5. Al-Daraiseh, M. Georgiopoulos, G. Anagnostopoulos, A. S. Wu, M. Mollaghasemi., “*GFAM: A Genetic Algorithm Optimization of Fuzzy ARTMAP*”, accepted in the IEEE World Congress on Computational Intelligence 2006.
6. Assem Kaylani, Al-Daraiseh Ahmad, Michael Georgiopoulos, Mansooreh Mollaghasemi, Georgios Anagnostopoulos and Annie Wu “Genetic Optimization of ART Neural Network Architectures”(Accepted to IJCNN 2007)
7. Al-Daraiseh Ahmad, “Hybrid Genetic ART NN”(Accepted to ASEE 2009)

PROFESSIONAL ACTIVITIES

- Member of the Jordanian Engineers Association since 1998

PERSONAL

- Born in 1975, Married with three children
- Enjoy swimming, walking, hiking, and playing chess

REFERENCES

- Prof. **Michael Georgiopoulos**, **Major Dissertation Advisor**, Graduate Program Coordinator of EE, School Electrical Engineering and Computer Science, University of Central Florida. (407) 823-5338, michaelg@mail.ucf.edu
- Dr. **Sa'ed Abed**, Assistant Prof. Computer Engineering Dpt, Hashemite University, Jordan. (+962797223771)
- Dr. **Awni Tradat**, Computer Engineering Dpt Chair, Hashemite University, Jordan. (+962779825079)
- Prof. **Issa Batarseh**, Director of EECS, School Electrical Engineering and Computer Science, University of Central Florida. (407) 823-2786, batarseh@mail.ucf.edu
- Prof. **Avelino J. Gonzalez**, School Electrical Engineering and Computer Science, University of Central Florida. (407) 823-5027, gonzalez@pegasus.cc.ucf.edu
- Prof. **Haitham Al-Deek**, Director of Transportation Systems Institute (TSI), Department of Civil & Environmental Engineering, University of Central Florida. (407) 823-2988, haldeek@mail.ucf.edu
- Dr. **Gerd Brummel**, head of R&D department Siemens PG. +49 30 3464 4158, hans-gerd.brummel@siemens.com