

## **Μαρία Δρακάκη**

Αναπληρώτρια Καθηγήτρια

Τμήμα Μηχανικών Αυτοματισμού ΤΕ

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## **ΣΠΟΥΔΕΣ**

1986 **Πτυχίο Φυσικής**, Αριστοτέλειο Πανεπιστήμιο Θεσσαλονίκης, βαθμός: 8.75.

1992 **Ph.D.**, Physics Department, University of Texas at Austin, Austin, TX, U.S.A.

2004 **M.Sc.** in VLSI System Design, University of Westminster, London, U.K.

## **ΒΡΑΒΕΙΑ-ΥΠΟΤΡΟΦΙΕΣ-ΑΚΑΔΗΜΑΪΚΕΣ ΔΙΑΚΡΙΣΕΙΣ**

-Fulbright Scholarship (1987).

-Χρηματικά βραβεία Υπουργείου Παιδείας για άριστη ακαδημαϊκή επίδοση στο Τμήμα Φυσικής του Α.Π.Θ. (1984-1986).

-Αποφοίτηση με άριστα από το Τμήμα Φυσικής του Α.Π.Θ.

-Tuition Scholarship, Physics Department, University of Texas at Austin, (1987).

-Best Paper Award, 38th International Conference on Information Systems Architecture and Technology – ISAT 2017, September 17-19, Szklarska Poręba, Poland.

## **ΕΠΑΓΓΕΛΜΑΤΙΚΗ-ΕΚΠΑΙΔΕΥΤΙΚΗ ΕΜΠΕΙΡΙΑ**

5/2018- έως σήμερα: Αναπληρώτρια Καθηγήτρια του Τμήματος Μηχανικών Αυτοματισμού ΤΕ, Αλεξάνδρειο Τεχνολογικό Εκπαιδευτικό Ίδρυμα Θεσσαλονίκης (ΑΤΕΙΘ), Αναπληρώτρια Καθηγήτρια με γνωστικό αντικείμενο “Ευέλικτα Συστήματα Παραγωγής και Εφοδιασμού και Ηλεκτρονικά Συστήματα”.

2/2014 - έως 5/2018 Επίκουρη Καθηγήτρια του Τμήματος Μηχανικών Αυτοματισμού ΤΕ, Αλεξάνδρειο Τεχνολογικό Εκπαιδευτικό Ιδρυμα Θεσσαλονίκης (ΑΤΕΙΘ),

2005-1/2014 Επιστημονικός Συνεργάτης στο Τμήμα Μηχανικών Αυτοματισμού ΤΕ, ΑΤΕΙΘ.

10/1993 – 2/2013 Επιστημονικός/Εργαστηριακός Συνεργάτης στο Τμήμα Ηλεκτρονικών Μηχανικών ΤΕ, ΑΤΕΙΘ.

1993-2008, 2015 Επιστημονική υπεύθυνος/Ερευνήτρια/Αξιολογητής σε ερευνητικά έργα της ΓΓΕΤ, BRITE/EURAM II, BRITE/EURAM III.

1988-1992 Graduate Teaching Assistant, Physics Department, University of Texas at Austin, U.S.A.

1989 – 1992 Graduate Research Assistant/Research Engineering Scientist, Physics Department, University of Texas at Austin, USA.

#### **ΔΗΜΟΣΙΕΥΣΕΙΣ ΣΕ ΔΙΕΘΝΗ ΠΕΡΙΟΔΙΚΑ ΜΕ ΚΡΙΤΕΣ**

1. Drakaki, M. and Tzionas, P., "Investigating the impact of inventory inaccuracy on the bullwhip effect in RFID-enabled supply chains using colored petri nets", Journal of Modelling in Management, in press
2. Drakaki, M., Gören, H. G. Tzionas, P., " An Intelligent Multi-Agent Based Decision Support System for Refugee Settlement Siting, International Journal of Disaster Risk Reduction, vol. 31, 2018, pp. 576-588.
3. Drakaki, M. and Tzionas, P., "Community based social partnerships in crisis resilience: a case example in Greece", Disaster Prevention and Management, vol. 26, No. 2, 2017, pp. 203-216
4. M. Drakaki, and P. Tzionas, " Manufacturing Scheduling Using Colored Petri Nets and Reinforcement Learning", Applied Sciences, vol. 7, No. 2, 2017, 136.
5. M. Drakaki, and P. Tzionas, "Modeling and performance evaluation of an agent-based warehouse dynamic resource allocation using Colored Petri Nets", International Journal of Computer Integrated Manufacturing, vol. 29, No. 7, 2016, pp. 736-753
6. Drakaki, M., Siskos, S., Hatzopoulos, A., "A 0.5-20 GHz bandwidth enhanced distributed amplifier", Microelectronic Engineering, vol. 90, 2012, pp. 26-28
7. Drakaki, M., Siskos, S., Hatzopoulos, A., "A De-Embedding method for RF CMOS Inductor Measurements ", Microelectronics Journal, vol. 40, 2009, pp. 958-965
8. Drakaki, M., Siskos, S., Hatzopoulos, A., "A Comparative Evaluation of De-Embedding Methods for on-wafer RF CMOS Inductor S-parameter Measurements", Physica Status Solidi, C, Current Topics in Solid State Physics, Vol 5, No. 12, 2008, pp. 3671-3676

9. Noulis T., Drakaki, M., Siskos, S., "Complete Analysis of BSIM3V3 Noise Models for the optimum design of a low noise preamplifier", Journal of Physics, Conference Series, Vol. 10, No. 1, 2005, pp. 369-372
10. Pecz B., Zekendes K., Drakaki, M., Barna P., Stoemenos J., "Epitaxially grown  $\beta$ -SiC on Si, interface structural characterization", Journal of the Mechanical Behaviour of Materials, Vol. 6, 59 (1995).
11. Araya-Pochet, J.A., Chen J., Drakaki M., Erskine, J.L., "Magneto-optical studies of ultrathin epitaxial films", Journal of Physics: Condensed Matter, 5, A191 (1993)
12. Chen J., Drakaki M., Erskine, J.L., "Chemisorption-induced change in thin-film spin anisotropy: Oxygen adsorption on the p(1x1) Fe/Ag(100) system", Physical Review B, 45, 3636 (1992)

#### **ΔΗΜΟΣΙΕΥΣΕΙΣ ΣΕ ΠΡΑΚΤΙΚΑ ΔΙΕΘΝΩΝ ΣΥΝΕΔΡΙΩΝ ΜΕ ΚΠΙΤΕΣ**

1. Drakaki, M., Karnavas, Y.L., Chasiotis, I.D., Tzionas, P., Comparison of Fuzzy Multi Criteria Decision Making Approaches in an Intelligent Multi-agent System for Refugee Siting. In: Świątek J., Borzemski L., Wilimowska Z. (eds) Proceedings of 39th International Conference on Information Systems Architecture and Technology – ISAT 2018. Advances in Intelligent Systems and Computing 656. Springer, Cham, (2019).
2. Drakaki, M. Gören, H. G. Tzionas, P.: An Intelligent Multi-Agent System using Fuzzy Analytic Hierarchy Process and Axiomatic Design as a Decision Support Method for Refugee Settlement Siting. In: Proceedings of ICDSST-PROMETHEE 2018. Lecture Notes in Business Information Processing LNBIP. Springer (2018).
3. Drakaki, M., Goren, H. G., Tzionas, P., A Multi-agent System Based Site Selection Method for Conflicts and Natural Disasters, 16th International Logistics and Supply Chain Congress, 2018, Denizli, Turkey.
4. Drakaki, M., Tzionas, P., Modeling the Order Fulfilment Process Using Colored Petri Nets, 4th International Conference on Supply Chains, 4<sup>th</sup> Olympus ICSC, 2018, Katerini, Greece.
5. Drakaki, M., Karnavas, Y.L., Chasiotis, I.D., Tzionas, P., An Intelligent Multi-Agent System Framework for Fault Diagnosis of Squirrel-Cage Induction Motor Broken Bars. In: Świątek J., Borzemski L., Wilimowska Z. (eds) Proceedings of 38th International Conference on Information Systems Architecture and Technology – ISAT 2017. Advances in Intelligent Systems and Computing 656. Springer, Cham, (2018). (Best paper award).
6. Y. Karnavas, A. Topalidis and M. Drakaki, "Development of a Low Cost Brushless DC Motor Sensorless Controller Using dsPIC30F4011", 7<sup>th</sup> International Conference on Modern Circuits and Systems Technologies, MOCAST, 2018, Thessaloniki, Greece.
7. Isaakidis, G., Spiropoulos, A., Drakaki, M., "A Wireless Three Dimensional Printer for Printed Circuit Board Applications" 4th Panhellenic Conference on Electronics and Communications, PACET, 2017, Xanthi, Greece.

8. Giannopoulos, G., Drakaki, M., "Design and manufacture of voice distortion device in real time", 2nd International Workshop on Microsystems, 2017, Thessaloniki, Greece.
9. M. Drakaki, G. Kovacs, and P. Tzionas, "The logistics role in community resilience: a case example of a community based social partnership in Greece, 6<sup>th</sup> International Symposium and 28<sup>th</sup> National Conference in Operational Research, HELORS, 2017, Thessaloniki, Greece.
10. Isaakidis, G., Spiropoulos, A., Drakaki, M., "An Educational Purpose Built Three Dimensional Printer" 6<sup>th</sup> International Conference on Modern Circuits and Systems Technologies, MOCAST, 2017, Thessaloniki, Greece.
11. D. Bechtis, M. Drakaki, and D. Vlachos, "Using Agent-Based Modeling for the Design of Agrifood Supply Chains with Emergency Replenishments", 1<sup>st</sup> International Conference of Agrifood Supply Chain Management and Green Logistics, 2015, pp. 421-430, Chalkidiki, Greece.
12. Perassis Eleftherios, Petridis Ioannis, and M. Drakaki, "Wireless Bluetooth Control Module for a DC Motor", 2<sup>nd</sup> Panhellenic Conference on Electronics and Communications, PACET, 2012, Thessaloniki, Greece.
13. Drakaki, M., Hatzopoulos, A., Siskos, S., "Improved Calculation of Differentially Driven RF CMOS Inductor Model Parameters", Design of Circuits and Integrated Systems, DCIS, 2007, pp. 76-80, Seville, Spain.
14. Drakaki, M., Hatzopoulos, A., Siskos, S., "Improving the Quality Factor Estimation for differentially Driven RF CMOS Inductors", European Conference on Circuit Theory and Design, ECCTD, 2007, pp. 599-602, Seville, Spain.
15. Drakaki, M., Hatzopoulos, A., Siskos, S., "CMOS Inductor Performance Estimation using Z- and S-parameters", IEEE ISCAS International Symposium Circuits Systems, ISCAS, 2007, pp. 2256-2259, New Orleans, USA.
16. Drakaki, M., Hatzopoulos, A., Siskos, S., Papakostas D., "Comparison of RF Inductor Parameter Evaluation Methods", International Conference on Electronics, Hardware, Wireless and Optical Communications, EHAC, 2007, pp. 35-39, Corfu, Greece.
17. Drakaki, M., Hatzopoulos, A., Siskos, S., "Improving the Accuracy of the De-embedding Methods for on-wafer RF Measurements", Design of Circuits and Integrated Systems, DCIS, 2006, Barcelona, Spain.
18. Drakaki, M., Fikos, G., Siskos, S., "Analog Signal Processing Circuits using Floating Gate MOS Transistors", 5<sup>th</sup> International Conference on Technology and Automation, ICTA, 2005, pp. 322-327, Thessaloniki, Greece.
19. Drakaki, M., Fikos, G., Siskos, S., "Subthreshold Behaviour Modeling of FGMOS Transistors using the ACM and the BSIM3V3 Models", 12<sup>th</sup> IEEE Mediterranean Electrotechnical Conference, MELECON, 2004, pp. 55-58, Dubrovnik, Croatia.

20. M. Drakaki, L. Berkovi, I. Kale, and S. Siskos, "Non-Quasi-Static Transient Analysis Modeling of the Floating Gate MOS Transistor", *Second International Conference on Microelectronics, Microsystems and Nanotechnology*, MMN 2004, Nov. 2004, Athens, Greece.
21. Chen J., Drakaki M., Erskine, J.L., "Magnetic anisotropy of Epitaxial Fe Thin Films on Ag(100)", *Bulletin of the American Physical Society*, 36, 677 (1991), Cincinnati, OH, March Meeting of the American Physical Society.
22. Chen J., Drakaki M., Ballentine, C.A., Erskine, J.L., "SMOKE Investigation of Ultrathin Fe Films Epitaxially Grown on W(100)", *Bulletin of the American Physical Society* 35, 199 (1990), New Orleans, LA, March Meeting of the American Physical Society.

## **ΕΡΕΥΝΑ**

Ευέλικτα συστήματα παραγωγής και εφοδιασμού, ευφυής παραγωγή (intelligent manufacturing), συστήματα λήψης αποφάσεων, πολυπρακτορικά συστήματα (multi-agent systems), διαχείριση και έλεγχος εφοδιαστικής αλυσίδας, Colored Petri Nets, μοντελοποίηση βιομηχανικών συστημάτων, ανθρωπιστικά logistics.

## **ΜΕΛΟΣ ΕΠΙΣΤΗΜΟΝΙΚΗΣ ΕΠΙΤΡΟΠΗΣ (2017-2019)**

Σε 4 διεθνή συνέδρια.

## **ΟΡΓΑΝΩΤΗΣ SPECIAL SESSION ΔΙΕΘΝΟΥΣ ΣΥΝΕΔΡΙΟΥ (2017-2019)**

Σε 1 διεθνές συνέδριο.

## **ΚΡΙΤΗΣ ΣΕ ΔΙΕΘΝΗ ΠΕΡΙΟΔΙΚΑ (2017-2019)**

Κριτής σε 6 διεθνή περιοδικά.

## **ΚΡΙΤΗΣ ΣΕ ΔΙΕΘΝΗ ΣΥΝΕΔΡΙΑ (2017-2019)**

Κριτής σε 6 διεθνή συνέδρια.

## **ΔΙΔΑΣΚΑΛΙΑ**

“Διαχείριση και Έλεγχος Εφοδιαστικής Αλυσίδας” (Θεωρία), “Ηλεκτρονική” Θεωρία), “Ηλεκτρονική” (Εργαστήριο), “Ψηφιακά Συστήματα (Θεωρία), “Ψηφιακά Συστήματα” (Εργαστήριο) (2018-2019).

## **ΑΚΑΔΗΜΑΪΚΟ ΔΙΟΙΚΗΤΙΚΟ ΕΡΓΟ**

Αντιπρόεδρος Τμήματος Μηχανικών Αυτοματισμού ΤΕ (Δεκ. 2017-σήμερα).

## **ΜΕΤΑΦΡΑΣΗ ΚΑΙ ΕΠΙΜΕΛΕΙΑ ΜΕΤΑΦΡΑΣΗΣ**

Σε ένα ξενόγλωσσο επιστημονικό βιβλίο.