CURRICULUM VITAE

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Educational Background

- **Ph. D.**, Electrical Engineering, University of Michigan, Ann Arbor, USA, Oct. 1992
  - **Ph. D. Thesis**: *Theoretical Characterization of Coplanar Waveguide Transmission Lines and Discontinuities*
- **M. Sc.**, Electrical Engineering, Kuwait University, Kuwait, Sep. 1987 (GPA 3.87/4.0)
  - **M. Sc. Thesis**: *Spectral Domain Analysis of Finlines with Composite Ferrite and Dielectric Substrate*
- **B. Sc.**, Electrical Engineering, Kuwait University, Kuwait, June 1985 (GPA 8.46/9.0)

Research Interests

Computational Electromagnetics; Design and Analysis of passive microwave components; Antennas; Optimization techniques.

Teaching Interests

Teaching undergraduate and graduate courses related to electromagnetics, passive microwave circuits, and antennas.

Experience

- **Sep. 2017– now**: Professor, EE Dept., Jordan University of Science and Technology (JUST), Jordan.
- **Sep. 2015– Sep. 2017**: Professor, Electrical and Communication Eng. Dept., German Jordanian University (GJU), Jordan. (on sabbatical leave from JUST)
- **Sep. 2006– Sep. 2015**: Professor, EE Dept., Jordan University of Science and Technology (JUST), Jordan.
- **Sep. 2003– Sep. 2006**: Associate Professor, EE Dept., Jordan University of Science and Technology (JUST), Jordan.
- **July 2001–Feb. 2003**: Senior Research Engineer, Ansoft Corporation, New Jersey, USA.
- **Sep. 2000–July 2001**: Associate Professor, EE Dept., Jordan University of Science and Technology (JUST), Jordan.
- **Sep. 1995–Sep. 2000**: Assistant Professor, EE Dept., Jordan University of Science and Technology (JUST), Jordan.
- **Feb. 93–Aug. 1995**: Assistant Research Scientist, EECS Department, University of Michigan, Ann Arbor, Michigan, USA.
- **Oct. 92–Feb. 93**: Postdoctoral Research Fellow, EECS Department, University of Michigan, Ann Arbor, Michigan, USA.
- **Sep. 88–Oct. 92**: Graduate Student Research Assistant, EECS Department, University of Michigan, Ann Arbor, Michigan, USA.
- **Dec. 86–Sep. 88**: Laboratory Engineer (Instructor), ECE Department, Kuwait University, Kuwait.
- **June 86–Dec. 86**: Graduate Student Research Assistant, ECE Department, Kuwait University, Kuwait.
- **Sep. 85–June 86**: Graduate Student Teaching Assistant, ECE Department, Kuwait University, Kuwait.

Courses and Labs Taught

- Electromagnetics I, EE Dept., Jordan Univ. of Science & Technology, Jordan.
- Electromagnetics II, EE Dept., Jordan Univ. of Science & Technology, Jordan.
- Microwave Circuits, EE Dept., Jordan Univ. of Science & Technology, Jordan.
- Antenna Theory and Design, EE Dept., Jordan Univ. of Science & Technology, Jordan.
- Microwave Laboratory, EE Dept., Jordan Univ. of Science & Technology, Jordan.

- Circuits Laboratory, EE Dept., Jordan Univ. of Science & Technology, Jordan.
- Communications Laboratory, EE Dept., Jordan Univ. of Science & Technology, Jordan.

Research Grants

- PI: Analysis and Design of Compact Power Dividers with High Power-Split Ratio, JD 2760, Deanship of Scientific Research, Jordan Univ. of Science & Technology, 2018 (to support a Master student as a research assistantship).
- PI: Study of Optical Antennas for Visible and Infrared Radiation, JD 3480, Deanship of Scientific Research, Jordan Univ. of Science & Technology, 2018 (to support a Master student as a research assistantship).
- PI: Study of Cultural Algorithm and Its Application in Electromagnetics and Antennas, JD 3180, Deanship of Scientific Research, Jordan Univ. of Science & Technology, 2018 (to support a Master student as a research assistantship).
- PI: Biogeography-Based Optimization Method and its Application in Electromagnetics, JD 2980, Deanship of Scientific Research, Jordan Univ. of Science & Technology, 2010 (to support a Master student as a research assistantship).
- PI: Design and Analysis of Wilkinson and Gysel Power Dividers for Wireless Communications Applications, JD 2800, Deanship of Scientific Research, Jordan Univ. of Science & Technology, 2010 (to support a Master student as a research assistantship).
- PI: Finite Difference Time Domain Analysis of Cylindrical Structures containing ferrite media. JD 1100, Deanship of Scientific Research, Jordan Univ. of Science & Technology, 2000.
- Co-PI: Finite Difference Time Domain Analysis of Cylindrical Structures. $10K, Univ. of South Florida, Tampa, 1997. (PI: Dr. Tom Weller, EE dept., USF).
- Co-PI: Application of Numerical Methods to the Solution of Problems in Electrical and Electronic Engineering. JD 1400, Deanship of Scientific Research, Jordan Univ. of Science & Technology, 1996.

Honors and Awards

- Recipient of the distinguished researcher award from the Ministry of Higher Education and Scientific Research, Jordan, 2012.
- Recipient of Al-Hussein Decoration for Distinguished Contribution-Second Order, 2007.
- Recipient of the distinguished research paper prize from the Ministry of Higher Education and Scientific Research, Jordan, 2007.
- Obtained an average of approximately 9/10 in the students evaluation during the years spent at the EE department at JUST.

- Recipient of the Raj Mittra Travel Grant (RMTG) for the 1999 IEEE AP-S International Symposium and USNC/URSI National Radio Science Meeting, July 11-16, 1999, Orlando, FL, USA.
- 1991-1992 academic year Pre-Doctoral Rackham Fellowship, University of Michigan, Ann Arbor. (Awarded annually to two electrical engineering graduate students)
- Research Assistantship from the University of Michigan during the Ph. D. studies.
- Academic Assistant Scholarship from Kuwait University from Sep. 85 to Dec. 86.
- Placed on the Honor List at Kuwait University from 1981 till 1985 (B. Sc. program).
- Prize for having the third highest average (97.2%) at high school (Tawjihi) in Kuwait in 1981.

Professional Activities

- Acts as a reviewer for several international specialized peer-reviewed journals.
- Member of the editorial board of: Applied Computational Electromagnetics Society (ACES) Journal, International Journal of Applied Engineering Research (IJAER), and Journal of Applied Electromagnetism.
- Past member of the editorial board of International Journal of RF and Microwave Computer-Aided Engineering, and Int. J. of Modeling and Simulation.
- Member of the TPC for Microwaves, Antennas and Propagation (MAP) Conference, MIC-CPE 2011, Amman, Jordan, 4-6 February 2011.
- Member of the TPC for the Special Session on Computational and Optimization Methods Applied to Antenna Systems (COMAS), MIC-CPE 2013, Kenitra, Morocco, 1-3 February 2013
- Member of the TPC of The 8th Jordanian International Electrical & Electronics Engineering Conference, 2013.
- Served as a member of the technical program committee for the 2006 Wireless Euro-Mediterranean International Conference, Amman, Jordan.
- Served as a member of the technical program committee for the 2005 Jordanian International Electrical & Electronics Engineering Conference, Amman, Jordan.
- Member of the Faculty of Engineering Council at JUST as a representative of the EE department in the academic years 1999/2000, 2006/2007, and 2007/2008.
- Member of several departmental committees in the EE department at JUST.
- Reviewed the the book by Dennis Sulivan entitled "EM Simulation Using the FDTD Method" which was submitted to IEEE for publication.

- Co-chaired the session: "Antenna Human Interactions " at the 1999 IEEE AP-S Int. Symp., Orlando, July 11-16 1999.
- Member of the editorial board of several specialized international journals.
- Senior member of the IEEE.
- Spent summer of 1997 at the EE Department, University of South Florida, USA, as a visiting researcher.
- Founded the Jordan University of Science and Technology IEEE Student Branch (the first IEEE-SB in Jordan) in 1996, and served as its counselor from September 1997 to June 2000.
- Head of the Undergraduate Projects Committee at the EE department, Jordan University of Science and Technology, for the academic years 1997/1998, 1998/1999, 1999/2000, 2000/2001, 2003/2004, 2004/2005, 2005/2006.
- Participated in putting together the first booklet about the EE department at the Jordan University of Science and Technology, 1997.
- Member of the Technical Program Committee of the 1993 IEEE Antennas and Propagation Society International Symposium, Ann Arbor, MI, USA.
- Chaired the session: "Time Domain Methods I, " 1993 IEEE AP-S International Symposium, Ann Arbor, MI, USA.
- Co-chaired the session: "Analysis of Microstrip Antennas", 1992 IEEE AP-S International Symposium.
- Member of the Executive Committee of the IEEE Student Branch at Kuwait University during the academic year 1984-1985.

Supervised Master Theses

1. Majid Khodier, *Analysis and Modeling of Shielded Coplanar Stripline (CPS) Discontinuities*, EE Dept., Jordan University of Science and Technology (JUST), July 1997. (At the present time, Dr. Majid is a Professor at Jordan Univ. of Science and Techology).
2. Asem Al-Zoubi, *A Study of the Characteristics of the Cylindrical Coplanar Waveguide (CCPW)*, EE Dept., JUST, Dec. 1998. (At the present time, Dr. Asem is an Associate Professor at Yarmouk University, Jordan).
3. Hani Barkawi, *Full-Wave Analysis of Waveguides and Transmission Lines Using the Two-Dimensional Finite Difference Frequency Domain Method*, EE Dept., JUST, Dec. 2007. (At the present time, Hani is a manager at Utilnet Company, Jordan).
4. Mohammad Rawashdeh, *Full-Wave Analysis of Circular Guiding Structures Using the Two-Dimensional Finite Difference Frequency Domain Method*, EE Dept., JUST, May 2008. (At the present time, Dr. Mohammad is an Assistant Professor at Yarmouk University, Jordan).

5. Hani Muhsen, *Taguchi's Optimization Method and Its Application to the Design of Antennas*, EE Dept., JUST, August 2009. (At the present time, Dr. Hani is an Assistant Professor at German Jordanian University, Jordan).

6. Gubran Mohammad, *Central Force Optimization and Its Application to the Design of Antennas*, EE Dept., JUST, August 2009. (At the present time, Gubran is a PhD student at University of Galsgow, UK).

7. Ayman Sabbah, *Evaluation of SAR and Temperature Elevation in a Multi-Layered Human head Model Exposed to RF Radiation*, EE Dept., JUST, July 2010. (At the present time, Dr. Ayman is an Assistant Professor at Carleton University, Canada).

8. Abdullah Qaroot, *Analysis and Design of Different Topologies of Multi-band N-Way Wilkinson Power Dividers*, EE Dept., JUST, August 2010. (At the present time, Abdullah is a PhD student at Univ. of South Florida, USA.).

9. Melad Olaimat, *Design and Analysis of Triangular Microstrip Patch Antennas for Wireless Communication Systems*, EE Dept., JUST, August 2010. (At the present time, Melad is a PhD student at Waterloo university, Canada).

10. Mojahed Assi, *Design of Multilayer Microwave Absorbers Using Evolutionary Optimization Techniques*, EE Dept., JUST, August 2010. (At the present time, Mojahed works in Italy).

11. Khair Shamaileh, *Analysis and Design of Compact Planar Passive Microwave Components for Wireless Applications*, EE Dept. JUST, March 2011. (At the present time, Dr. Khair is an Assistant Professor at Purdue University Northwest, USA).

12. Ashraf Sharaqa, *Biogeography-Based Optimization Method and its Application in Electromagnetics*, EE Dept., JUST, April 2012. (At the present time, Ashraf works as a Radio Engineer, WorleyParsons Arabia Ltd, SA).

13. Derar Hawatmeh, *Design and Analysis of Wilkinson and Gysel Power Dividers for Wireless Communications Applications*, EE Dept., JUST, May 2012. (Derar got his PhD from the University of South Florida, Tampa, USA. He works at Qorvo, Inc., FL, USA.).

14. Omar Abu Al-Nadi, *Analysis and Design of Compact Multi-Frequency Bagley Power Dividers*, EE Dept., JUST, Jan. 2013. (At the present time, Omar works at Ericsson, Spain).

15. Shaimaa Nasser, *Design and Analysis of Ultra-Wideband Printed Antennas for Wireless Applications*, EE Dept., JUST, August 2015. (At the present time, Shaimaa is a PhD student at Khelifa university, UAE).

16. Omar Jibreel, *Analysis and Design of Compact Power Dividers with High Power-Split Ratio*, EE Dept., JUST, Jan. 2019. (At the present time, Omar is a PhD student at University of South Florida, USA).

17. Heba Jaradat, *Design and Analysis of Microwave Components Based on Coplanar Waveguide (CPW)*, EE Dept., JUST, Feb. 2019. (At the present time, Heba is a lecturer at Al-Husain Technical University (HTU), Jordan).

18. Amer Abu Areesheh, *Study and Design of Nano-Antennas Excited by Laser*, EE Dept., JUST, Aug. 2019.

19. Participated in several Master Theses committees at the EE Department, Jordan University of Science and Technology.

Supervised Undergraduate Senior Projects

1. G. Shaheen, An interactive demonstration of EM wave propagation using time-domain finite differences, 1st semester, 1996.

2. H. Amer, Distributed lowpass filter design implemented using PUFF, 2nd semester, 1996.

3. F. Ameera, The finite difference time domain technique, 1st semester, 1997.

4. T. Ababneh, Finite element analysis of static EM Laplace's Equation, 1st semester, 1997.

5. M. Lamber, Solution of Laplace's equations using finite difference methods, 2nd semester, 1998.

6. A. Zereeni, Method of Moments, 1st semester, 1998.

7. S. Dodokh, Interfacing the solution of Laplace's equations using the finite difference method, 1st semester, 1998.

8. B. AbdulGhani, Yagi Uda Antenna, June 1999.

9. K. Obeidat, 3D- Finite Difference Solution of Laplace's Equation in Cylindrical Coordinates, June 1999.

10. H. Barakat, Analysis of Ferrite Loaded Rectangular Waveguides Using the 2D-FDTD Method, Jan. 2000.

11. F. Shahin, A Study of Microstrip Patch Antennas, Jan. 2000.

12. M. Al-Zou'bi, 1D-FDTD Analysis of Propagating Waves, Jan. 2000.

13. A. Zaghmouri, Monte-Carlo Method, June 2000.

14. R. Maaiah, The Monte-Carlo Method, June 2000.

15. R. Abdallah, Tubes and Slices Method, June 2000.

16. R. Jalboush, Simulation of Smith Chart Using C++ Tools, June 2000.

17. S. Makki, Fourier Theory of Nonsinusoidal Electromagnetic Signals, Jan. 2001.

18. M. Al-Essa, Conformal Mapping Technique, Jan. 2001.

19. K. Thalji, Antenna Analysis and Design, June 2001.

20. M. Hamlan, ANFIS Computation of Resonant Frequency of Microstrip Antennas, June 2001.

21. F. Elmoftah, Using FDTD to Solve EM Problems (One and Two Dimensional), June 2001.

22. Osama Abel-Halim, Applications of Monte-Carlo Technique in Electromagnetics, June 2004.

23. H. Barakawi, and Y. Yousef, Microwave Filter Design, Jan. 2005.

24. M. Tarifi, Reduced Size Quadrature Couplers, Jan. 2005.

25. A. AbdulRahman, Magnetic Resonance Imaging, Jan. 2005.

26. Z. Duraidy, Antenna Array Design Using Java Script, Jan. 2005.

27. Hadi Matar and Mahmoud Al-Zu'bi, Artificial Neural Networks and Their Applications to Microwave Problems, June 2005.

28. R. Sarraj, and M. Ayyat, Design of Microstrip Patch Antennas Using FR4 Substrate, Jan. 2006.

29. A. Jisrawi, Design and Implementatin of GSM-900 Jammer, Jan. 2006.

30. H. Nassar, and R. Masaad, A study on Microwave Filters and Wilkinson Dividers, June 2006.

31. Y. Najjar and M. Shehab, Design and Analysis of Horn Antennas, June 2006.

32. Y. Maa'rrawi, M. Zuhair, and M. Simsimiyeh, WLAN Transceiver, June 2006.

33. A. Gheethan, and Y. Mahameed, Analysis, Design, and Implementation of WCDMA Phase Locked Oscillator, Jan. 2007. (Funded by Al-Bahith Co., Amman.)

34. M. Abu-Dyouk, and M. Abu-Yousef, Design, Simulation, and Test of a 900 MHz Low Noise Amplifier, Jan. 2007. (Funded by Al-Bahith Co., Amman.)

35. H. Jwaied, and F. Muwanes, Multi-Band Multi-Section Transmission Line Transformers and Their Applications in Wilkinson Power Dividers, June 2007. **(Won a prize from IET-Jordan for undergrad projects contest in Jordanian universities.)**

36. S. Al-Mulazim, and H. Al-Mashaqbah, Design, Analysis, and Implementation of Metamaterial Branch Line Couplers, Jan. 2008.

37. M. Hasan, Analysis of Propagation Characteristics in Waveguides Loaded with Metamaterials, May 2008.

38. A. Sabri, and M. Nassrallah, Design and Implementation of a 915 MHz Doppler Radar, May 2008.

39. A. Abdul-Rahman, and A. Mohammad, Dual Band Mobile Jammer for GSM 900 and GSM 1800, May 2008. **(Won the first prize in National Technology Parade 2008, Amman.)**

40. M. Asali, and A. Abu-Hussein, Design and Implementation of Land Mine Detector, Jan. 2009.

41. I. Al-Yafawi, Study of Microstrip Interdigital capacitor and Its Application in the Design of Low-pass Filters, Jan. 2009. **(Won a prize in National Technology Parade 2009, Amman.)**

42. O. Nadi, and F. Hasweh, Design and Implementation of Triple-Band Cell Phone Jammer, June 2009. **(Won a prize from the Jordan Engineers Association, Amman.)**

43. M. Nasser, D. Hawatmeh, and E. Rababaa, Analysis and Design of Multi-Band and UWB Microstrip Antennas, Jan. 2010.

44. A. Abu-Omar, Design and Implementation of Robotic Arm Control System, Jan. 2010.

45. M. Fakher, B. AlZoubi, and M. Qatramez, Design of a Low Budget USB Powered Vector Network Analyzer, Jan. 2011.

46. M. Abu-Issa, O. Jibreel and H. Seelawi, Design of Dual Band Cell Phone Jammer Using Microstrip Antenna, May 2011.

47. J. Dughaily and M. Abu-Al-Hiaja, Design and implementation of an RFID based automatic students attendance system, May 2012. **(participated in the 5th National Technology Parade)**

48. M. Abu-Zainah, M. Absi, and A. Eyad, Design and implementation of a magnetic suspension system, May 2012.

49. S. Naser and A. Zeinat, Design and Impelementation of RF Energy Harvester, Jan. 2013. **(participated in the 6th National Technology Parade)**

50. H. Bani Yaseen and O. Saadeh, Design and Implementation of Compact and Portable Dual-Band GSM Jammer, Jan. 2013. **(participated in the 6th National Technology Parade)**

51. A. Nojoom and A. Jibreel, Optimal Power Flow Using BBO, Jan. 2013.

52. Anas Saci, Design of Compact Branch Line Couplers and Bagley Power Dividers Using Artificial Transmission Lines, May 2013.

53. A. Jarwan, Design and Analysis of Compact Multi-band Rat-Race Couplers, Jan. 2014.

54. M. Tarifi and A. Khalili, Design and Analysis of Bailey Power Dividers, Jan. 2014.

55. A. Sunjaq, Optimal Design of Multi-stage Inverters, June 2018.

56. F. Doqum, A. Rabee, and O. Olaimat, Design and Implementation of a Hybrid Renewable Energy System, Jan. 2019.

57. H. Abdul-Kareem, Design and Implementation of Multi-band Microstrip Patch Antennas, Jan. 2020.

Technical Publications

- **Journal Papers**

1. M. El-Shandwily and N. Dib, "Spectral Domain Analysis of Finlines with Composite Ferrite-Dielectric Substrate, " *Int. J. of Electronics*, pp. 571-583, April 1990.
2. N. Dib and L. Katehi, "Modeling of Shielded CPW Discontinuities Using the Space Domain Integral Equation Method (SDIE), " *Journal of Electromagnetic Waves and Applications*, Vol. 5, Nos. 4/5, pp. 503-523, 1991.
3. N. Dib, L. Katehi, G. Ponchak, and R. Simons, "Theoretical and Experimental Characterization of Coplanar Waveguide Discontinuities for Filter Applications, " *IEEE Trans. on Microwave Theory and Techniques*, pp. 873-882, May 1991.
4. N. Dib, W. Harokopus, G. Ponchak and L. Katehi, "A Comparative Study Between Shielded and Open Coplanar Waveguide discontinuities, " *International Journal of Microwave and Millimeter-Wave Computer Aided Engineering*, Vol. 2, No.4, pp. 331-341, Oct. 1992.
5. N. Dib and L. Katehi, "Impedance Calculation for the Microshield Line, " *IEEE Microwave and Guided Wave Letters*, pp. 406-408, Oct. 1992.
6. N. Dib, G. Ponchak and L. Katehi, "A Theoretical and Experimental Study of Coplanar Waveguide Shunt Stubs, " *IEEE Transactions on Microwave Theory and Techniques*, pp. 38-44, Jan. 1993.
7. N. Dib, R. Drayton and L. Katehi, " A Theoretical and Experimental Study of Microshield Circuits, " *Journal of Microwave and Optical Technology Letters*, pp. 333-339, May 1993.
8. N. Dib and L. Katehi, "Analysis of the Transition from Rectangular Waveguide to Shielded Dielectric Image Guide Using the Finite-Difference Time-Domain Method, " *IEEE Microwave and Guided Wave Letters*, pp. 327-329, Sep. 1993.
9. N. Dib, M. Gupta, G. Ponchak and L. Katehi, "Characterization of Asymmetric Coplanar Waveguide Discontinuities, " *IEEE Trans. on Microwave Theory and Techniques*, pp. 1549-1558, Sep. 1993.
10. A. Engel, N. Dib and L. Katehi, "Characterization of a Shielded Transition to a Dielectric Waveguide, " *IEEE Trans. Microwave Theory Tech.*, pp. 847-854, May 1994.
11. J. Yook, N. Dib and L. Katehi, "Characterization of High Frequency Interconnects Using Finite Difference Time Domain and Finite Element Methods, " *IEEE Trans. Microwave Theory Tech.*, pp. 1727-1736, Sep. 1994.
12. R. Drayton, N. Dib and L. Katehi, "Design of Micromachined High Frequency Circuit Components, " *The ISHM Int. J. of Microcircuits and Electronic Packaging*, pp. 19-28, Jan. 1995.
13. R. Simons, N. Dib, R. Lee and L. Katehi, "Integrated Uniplanar Transition for Linearly Tapered Slot Antenna, " *IEEE Trans. on Antennas and Propagation*, pp. 998-1002, Sep. 1995.

14. C. Ching, N. Dib and L. Katehi, "Theoretical Modeling of Cavity-Backed Patch Antennas Using a Hybrid Technique, " *IEEE Trans. on Antennas and Propagation*, pp. 1003-1013, Sep. 1995.

15. R. Simons, N. Dib and L. Katehi, "Coplanar Stripline to Microstrip Transition, " *Electronics Letters*, Vol. 31, No. 20, pp. 1725-1726, Sep. 1995.

16. N. Dib, R. Simons and L. Katehi, "New Uniplanar Transitions for Circuit and Antenna Applications, " *IEEE Trans. on Microwave Theory and Techniques*, Vol. 34, No. 12, pp. 2868-2873, Dec. 1995.

17. N. Dib and L. Katehi, "Characterization of Three Dimensional Open Dielectric Structures Using the Finite Difference Time Domain Method, " *IEEE Trans. on Microwave Theory and Techniques,* Vol. 44, No. 4, pp. 513-518, April 1996.

18. R. Simons, N. Dib and L. Katehi, "Modeling of Coplanar Stripline Discontinuities, " *IEEE Trans. on Microwave Theory and Techniques*, Vol. 44, No. 5, pp. 711-716, May 1996.

19. G. Ponchak, N. Dib and L. Katehi, "Design and Analysis of Transitions from Rectangular Waveguide to Layered Ridge Dielectric Waveguide, " *IEEE Trans. on Microwave Theory and Techniques*, Vol. 44, No. 7, pp. 1032-1040, July 1996.

20. J. Yook, N. Dib, E. Yasan and L. Katehi, "Modeling of Hermetic Transitions for Microwave Packages, " *International J. of Microwave and Millimeter-Wave Computer-Aided Engineering*, Vol. 6, No. 5, pp. 351-368, Oct. 1996.

21. A. Omar and N. Dib, "Analysis of Slot-Coupled Transitions from Microstrip-to-Microstrip and Microstrip-to-Waveguide, " *IEEE Trans. on Microwave Theory and Techniques*, pp. 1127-1132, July 1997.

22. T. Budka, E. Tentzeris, S. Waclawik, N. Dib, L. Katehi and G. Rebeiz, "Near-field Mapping above a Coupled-line Filter and a MMIC, " *Microwave Journal*, March 1998.

23. K. Hettak, N. Dib, A. Sheta and S. Toutain, " A Class of Novel Uniplanar Series Resonators and Their Implementation in Original Applications," *IEEE Trans. on Microwave Theory and Techniques*, pp. 1270-1276, Sep. 1998.

24. E. Tentzeris, M. Krumpholz, N. Dib and L. Katehi, " FDTD Characterization of Waveguide-Probe Structures, " *IEEE Trans. on Microwave Theory and Techniques*, pp. 1452-1460, Oct. 1998.

25. N. Dib, T. Weller, M. Scardelletti and M. Imparato, "Analysis of Cylindrical Transmission Lines with the Finite Difference Time Domain Method, " *IEEE Trans. on Microwave Theory and Techniques*, pp. 509-512, April 1999.

26. K. Hettak, A. Omar, N. Dib, A. Sheta, G. Delisle and S. Toutain, " Experimental and Theoretical Characterization of Miniature CPW Shunt Stubs Patterned on the Center Conductor, " *Int. J. of Electronics*, Vol. 86, No. 9, pp. 1123-1134, Sept. 1999.

27. A. Al-Zoubi, and N. Dib, "CAD model of a gap in a cylindrical coplanar waveguide, " *Electronics Letters*, Vol. 35, No. 21, pp.1857-1858, Oct. 1999.

28. K. Hettak, N. Dib, A. Omar, G. Delisle, M. Stubbs, and S. Toutain" A Useful New Class of Miniature CPW Shunt Stubs and Its Impact on Millimeter Wave Integrated Circuits, " *IEEE Trans. on Microwave Theory and Techniques*, pp. 2340-2349, Dec. 1999.
29. N. Dib, M. Khodier, and A. Omar, "Characterization of Shielded Coplanar Stripline (CPS) Discontinuities by Space Domain Integral Equation Method, " *Int. J. of Electronics*, pp. 1493-1512, Dec. 1999.
30. K. Hettak, N. Dib, A. Sheta, A. Omar, G. Delisle, M. Stubs and S. Toutain, "New Miniature Broadband CPW to Slotline Transitions, " *IEEE Trans. on Microwave Theory and Techniques*, pp. 138-146, Jan. 2000.
31. N. Dib, and A. Al-Zoubi, "Quasi-Static Analysis of Asymmetrical Cylindrical Coplanar Waveguide with Finite-Extent Ground, " *Int. J. of Electronics*, Vol. 87, No. 2, pp. 185-198, Feb. 2000.
32. N. Dib, and T. Weller, " Two dimensional finite difference time domain analysis of cylindrical transmission lines, " *Int. J. of Electronics*, volume 87, number 9, pp. 1065-1081, Sep. 2000.
33. N. Dib, and T. Weller, "Finite difference time domain (FDTD) analysis of cylindrical coplanar waveguide (CCPW) circuits, " *Int. J. of Electronics*, volume 87, number 9, pp. 1083-1094, Sep. 2000.
34. N. Dib, and A. Omar, "FDTD Analysis of a New Transition from Coplanar Waveguide to Rectangular Waveguide, " *Microwave and Optical Technology Letters*, Vol. 29, No. 3, pp. 199-201, May 2001.
35. N. Dib, and A. Omar, "Dispersion Analysis of Multilayer Cylindrical Transmission Lines Containing Magnetized Ferrite Substrates, " *IEEE Trans. on Microwave Theory and Techniques*, pp. 1730-1736, July 2002.
36. Nihad Dib, Qiu Zhang, and Ulrich Rohde, "New CAD Model of the Microstrip Interdigital Capacitor, " *Active and Passive Electronic Components*, Volume 27, Number 4, pp. 237 - 245, December 2004.
37. M. Scardelletti, N. Dib, T. Weller, J. Culver, and B. King, "Coplanar Waveguide-Fed Slot Antennas on Cylindrical Substrates, " *AEUE: Int. J. of Electronics and Communications*, Vol. 59, No. 1, pp. 25-30, March 2005.
38. N. Dib, "A Comprehensive Study of CAD Models of Several Coplanar Waveguide (CPW) Discontinuities, " *IEE Proc. Microwaves, Antennas & Propagation*, Vol. 152, No. 2, pp. 69-76, April 2005.
39. N. Dib, "CAD Modeling of Coplanar Waveguide Cross-Over Air-Bridge, " *International Journal of RF and Microwave Computer-Aided Engineering*, Vol. 15, No. 3, pp. 251-254, May 2005.
40. N. Dib, and A. Omar, "CAD Modeling of Coplanar Waveguide (CPW) Air-Bridges, " *International J. of Electronics*, Vol. 92, No. 7, pp. 417-426, July 2005.
41. N. Dib, J. Ababneh, and A. Omar, "CAD Modeling of Coplanar Waveguide Interdigital Capacitor, " *International Journal of RF and Microwave Computer-Aided Engineering*, Vol. 15, No. 6, pp. 551-559, Nov. 2005.

42. Abdel Fattah Sheta, Nihad Dib, and Ashraf Mohra, "Investigation of New Non-Degenerate Dual-Mode Microstrip Patch Filter, " *IEE Proc. Microwaves, Antennas & Propagation*, Volume 153, Issue 1, pp. 89-95, Feb. 2006.
43. N. Dib, T. Weller, and B. Lakshminarayanan, " Finite Difference Time Domain Modeling of Ceramic Multi-layer Capacitors Using Lumped Equivalent Models, " *Journal of Active and Passive Electronic Devices*, Vol. 1, Numbers 3&4, pp. 345-353, 2006.
44. J. Ababneh, M. Khodier, and N. Dib, "Synthesis of Interdigital Capacitors Based on Particle Swarm Optimization and Artificial Neural Networks, " *International Journal of RF and Microwave Computer-Aided Engineering*, Vol. 16, pp. 322-330, July 2006.
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