Esmaeel Tahanian

Earned Degrees

2011 – 2016 **PhD in Communication Engineering,** *Shahed University, Tehran, Iran.*

2007 – 2009 **M.Sc. in Communication Engineering,** *K. N. Toosi University of Technology, Tehran, Iran.*

2003 – 2007 **B.Sc. in Electrical Engineering**, *K. N. Toosi University of Technology, Tehran, Iran.*

Research Interests

- Optical Networks & Wireless Networks.
- High Frequency and High Speed Circuits.
- Microwave, mm-Wave and THz Devices and Circuits.
- Vaccum Electron Device : High frequency Tubes (TWT, Klystron and Magnetron) and High power Amplifiers (TWT and Klystron)
- Electromanetic Wave Propagation in Modern Wireless Systems.
- The Study of Electromagnetic Wave Effects on the Human Body.
- Electromagnetic Band Gap(EBG), Photonic Band Gap(PBG) Materials and Plasmonic Structures.

Publications

Journals

- **E.Tahanian** and G.Dadashzadeh, "A Novel Gap-Groove Folded-Waveguide Slow-Wave Structure for G-Band Traveling-Wave Tube" **IEEE Transactions on Electron Devices, VOL. 63, NO. 7, July 2016**.

- **E.Tahanian** and G.R.Dadashzadeh, "Two Novel Kinds of the G-Band Travelling-Wave Tubes with Multiple Gap-Groove Folded-Waveguides" **IEEE Transactions on Plasma Science, Vol. 45, No. 2, February 2017.**

- **E. Tahanian**, S. Chamaani and S. A. Mirtaheri, "Compact ultra-wideband bandpass filters using EBG", **Electronics letters, 16th September 2010, Vol. 46, No. 19.**

- **E.Tahanian**, G.Dadashzadeh and M.Khorshidi, "Pierce Gain Analysis for Sheet Beam Multiple Circuit Traveling Wave Amplifiers," J**ournal of electromagnetic wave and application, Vol. 29, No. 5, March 2015**.

- **E.Tahanian**, G.R.Dadashzadeh, "Gain Analysis of the Gap-Groove Folded-Waveguide Travelling-Wave Tube," J**ournal of electromagnetic wave and application, Published online: 17 Feb 2017.**

- **E.Tahanian** and M.R.Khorshidi,"A Compact Triple Band-Notched UWB Antenna Using Sinusoidal EBG," **Recent advances in electrical engineering, 2014, Vol. 7, No. 1.**

- M. Khorshidi**, E. Tahanian**, "A Novel Band-Reject UWB Antenna with Stable Omnidirectional Behavior", **Progress in electromagnetics research C, Vol 59, 31-40, 2015.**

- **E.Tahanian**, G.R.Dadashzadeh, "An Improved U-Shaped Microstrip Meander-Line Slow Wave Structure for High Efficiency G-band Traveling Wave Tubes," **Recent advances in electrical engineering**, Vol. 9, January 2016.

- **E.Tahanian** and H.Hasani, "Very compact UWB antenna with Group delay Improvement", **Serbian journal of electrical engineering , Vol. 12, No. 2, June 2015.**

Conferences

- **E.Tahanian** and G.Dadashzadeh, "A Novel Ridge-Gap-Waveguide Slow-Wave Structure for G-Band Travelling-Wave Tube", IST2016, Tehran.
- **E. Tahanian**, S. Chamaani and S. A. Mirtaheri, "Very Compact Ultra-Wideband Microstrip-Line Bandpass Filters Using EBG Embedded Multiple-Mode Resonator", **Accepted** by ***Asia–Pacific Microw. Conf.*, Dec. 2009.**

- **E.Tahanian**, G.Dadashzadeh and H.R.Taghvaee, "Simple Near Exact Image Solution for Vertical Antenna Above Lossy Ground Using Stationary Phase Approximation" **Accepted** by **Nemo 2014, Pavia, Italy.**

Presented Lecturers

Spring 2013	**"Terahertz Technology",** Shahed University, Tehran, Iran.
Fall 2012	**"Cross Talk in Microwave Circuits",** Shahed University.
Fall 2008	**" Metamaterial Applications in Microwave Engineering",** K . N. Toosi University of Technology, Tehran, Iran.
Spring 2008	**"Rain Effects on Radio Wave Propagation",** K . N. Toosi University of Technology, Tehran, Iran.

Professional Experiences

2012 **Design and Simulation of X-Band Magnetron**, Shahid Ghandi Research Center, Tehran, Iran.

2012 **Design and Simulation of L-Band Klystron**, Shahid Ghandi Research Center, Tehran, Iran.

2013 **Design and Simulation of a Terahertz Transmitter**, Shahed University, Tehran, Iran.

2012-2013 **Design and Simulation of Active Denial System (ADS)**, Shahid Ghandi Research Center, Tehran, Iran.

2016 **Design and Simulation of Wideband Network Cables**