Dr.JOBYMOL JACOB

PROFILE	Professor, Dept. of Electronics Engg. Model Engineering College, Thrikkakara, Kochi - 682021 Email : joby@mec.ac.in	
EXPERIENCE	24 YEARS IN TEACHING	

EDUCATION

Ph.D in the area of Semiconductor Device Modeling	IIT Madras
M.Tech –Embedded Systems	Cochin University of Science and Technology, India,
B Tech – Applied Electronics & Instrumentation	College of Engineering Trivandrum

RESEARCH INTERESTS

Mathematical Modeling of Semiconductor Devices – Heterojunction devices, Solar Cell Structures

RESEARCH EXPERIENCE

As a research scholar in Microelectronics and MEMS laboratory, Electrical Engineering Dept. of IIT Madras from July 2006 to April 2010 for pursuing Ph. D. Program.
As a research guide at Model Engineering College, Thrikkakara under APJ Abdul Kalam Technological University from July 2016 onwards guiding two full time and two part time Ph. D. Scholar

MEMBERSHIP IN PROFESSIONAL BODIES	
Life Member ISTE (Indian Society for Technical Education)	
SCHOLASTIC ACHIEVEMENTS	
- All India Rank 454 in GATE 2001 - HTRA Scholarship (MHRD, Govt. of India) IIT Madras, for pursuing Doctoral program.	
INTERNATIONAL JOURNALS PUBLICATION	
1. Jobymol Jacob, Amitava DasGupta, Michael Schroter, Anjan Chakravorty " Modeling Non-quasi Static Effects in SiGe HBTs ", IEEE Transactions on Electron Devices, vol. 57, pp. 1559-1566, July 2010.	
INTERNATIONAL CONFERENCES	
1. Jobymol Jacob, Amitava DasGupta, Anjan Chakravorty "Physics based modeling of non-quasi-static effects in SiGe-HBTs", Electron Devices and Semiconductor Technology, 2009. IEDST '09.	
2. Jobymol Jacob, Amitava DasGupta, Anjan Chakravorty, "Analysis of LCR Network for Modeling Non-quasi-static Effects in SiGe HBTs", XV International Workshop on Physics of Semiconductor Devices, 2009	
3. Jobymol Jacob, Amitava DasGupta, Anjan Chakravorty "Transient charge-based model for SiGe HBTs", IEEE International Conference in Emerging Trends in Electronic and Photonic Devices & Systems, 2009. ELECTRO '09.	
4.Kiran Susan Pavu, Jobymol Jacob "Analysis of Discrete Conduction Spectrum of Quantum Dots in Single Electron Transistors", IEEE International Conference on Electrical, Computer and Communication Technologies (ICECCT), 2015	
5. Gayathri N, Haresh Kumar Singh, Jobymol Jacob " Design and Implemetation of Sinc Filter for Signal Processing Applications " ICICICT-2017	
6. Vidheesha P. K., Jerin K. Antony, Jobymol Jacob, "Deep Learning based Edge Defect Detection," International Conference on Emerging Trends and Innovations in	

Engineering and Technological Research, TocH Institute of Science & Technology, July 2018.

7. Arun A.V., Ria Mariam Eldho, Jobymol Jacob, " Gate Tunable Thermionic Tunnel FET with n+ pocket" INDICON 2018, at Amrutha Vishwa Vidyapeetham, Coimbatore, Dec. 15-18, 2018

COURSES HANDLED

Sl.No	Course Name	UG/PG
1	Analog Integrated Circuits Design -I	PG (VLSI & Embedded Systems)
2	Analog Integrated Circuits Design -II	PG (VLSI & Embedded Systems)
3	Artificial Neural Networks	PG (Signal Processing)
4	Electronic Circuits	UG
5	Analog Integrated Circuits	UG
6	VLSI Design	UG
7	Solid State Devices	UG
8	Digital Electronics	UG
9	Network Theory	UG
10	Microprocessors	UG
11	Electronic Instrumentation	UG
12	Control System Theory	UG

OTHER DUTIES/RESPONSIBILITIES
External Academic Auditor of KTU.
Cluster Coordinator of M. Tech VLSI & Embedded Systems, Ernakulam Cluster-1 under KTU.
Research Coordinator, Model Engineering College, Thrikkakara.
PG Coordinator, Model Engineering College, Thrikkakara.
Coodinator of M. Tech -VLSI & Embedded Systems, Model Engineering College, Thrikkakara.
Coordinator DST-FIST Project , Model Engineering College, Thrikkakara (September 2015-September 2018)
Faculty Advisor of Mixed Signals (Electronics Students Association) of Model Engineering College, Thrikkakara
Faculty Advisor of ASIC (Association of M. Tech VLSI & ES Students) of Model Engineering College, Thrikkakara
Chair Person of Anti Sexual Harassment Committee of Model engineering College, Thrikkakara