Chief Patrons

Dr. B. S. Ragini Narayan, Donor Trustee, BMSET

Dr. P. Dayananda Pai, Chairman, BoG, BMSCE

Patrons

Dr. B. V. Ravishankar, Principal, BMSCE

Dr. S. Muralidhara, Vice-Principal, BMSCE

Organizing Chair

Dr. Arathi R. Shankar,
Associate Professor & HoD, Dept. of ECE, BMSCE

Co-ordinators

Dr. Rajath Vasudevamurthy, Assistant Professor
Email: rajathv.ece@bmsce.ac.in
Mobile: +91-7259520557

Dr. Maligi Anantha Sunil, Assistant Professor
Email: sunil.ece@bmsce.ac.in
Mobile: +91-9480773444

Registration

Registration fee:
UG students: Rs. 100/-
PG students/Full-time Research scholars: Rs. 150/-
Faculty: Rs. 200/-
to be paid to the following **Bank Account**:
Account No: 20274180376
Account Name: HOD-ECE
Bank Name: Indian Bank (Allahabad Bank)
B.M.S.C.E Campus, Hanumanthnagar, Bengaluru 560019.
IFSC Code: ALLA0212011

Interested participants are requested to register by filling out the following Google form:
https://forms.gle/qwcD3DhmpgjWZajm7

Last Date for Registration: 9th August 2020
E-certificates will be provided to all the participants who attend the course.

B. M. S. College of Engineering

Autonomous Institute under VTU

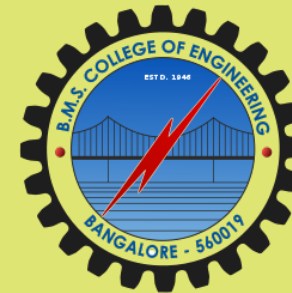**Accredited by NAAC with A++ grade**

presents

One-week Online
Value-added Course

on

Challenges and Opportunities in the Semiconductor Industry

10th August – 14th August, 2020

Organized by

Department of Electronics and Communication Engineering

in association with

The Institution of Electronics and Telecommunication Engineers (IETE)
Bangalore Centre

About the Institution

B.M.S. College of Engineering, Bengaluru has the unique distinction of being the first private engineering college established in the country in 1946. The institution owes its existence to the foresight and vision of its beloved founders, Late Śrī B. M. Sreenivasaiah and his illustrious son Śrī B. S. Narayan. Imparting quality education and training was the founder's vision for the development of skilled and competent engineers who will go on to become the workforce for the benefit of national prosperity.

The college initially started with three undergraduate programmes in 1946 and currently offers fourteen undergraduate and fifteen postgraduate programmes in conventional and emerging fields. In addition, the college also offers PhD programmes in fourteen of its departments which are recognized as research centers by the University, and is also approved as QIP Centre in Engineering and Technology by AICTE. The college maintains high academic quality standards, the certification by the National Board of Accreditation (NBA) bearing testimony for the same. The college has been an autonomous institute under VTU since 2008. In fact it is the first few institutions in the India to be bestowed with NBA in Tier-I Format (Washington Accord) in the year 2013. The institute is accredited by National Assessment and Accreditation Council (NAAC) with highest grade of A++ in the second Cycle with a CGPA of 3.83 on a scale of four. The institution is a proud recipient of TEQIP-III (World Bank Funded Project) after successful participation in TEQIP-I and II Projects. BMSCE is the only partner institution in the country with the Melton Foundation, USA which promotes cross-cultural learning for selected students along with peers from five other countries and is one of the most preferred higher educational destinations for students all across the country and also attracts students from South Asian and African countries.

About the Department

The department of Electronics and Communication Engineering (ECE) of BMSCE was established in 1971 with an initial intake of 60 students to the Under Graduate (UG) program and enhanced to an intake of 120 students from 1983 and 180 students from 2018. The department offers three Postgraduate Programmes: "M. Tech. Electronics" from 1986, "M. Tech. Digital Communication Engineer-ing" from 1996 with an intake of 18 students and "M. Tech. VLSI Design & Embedded Systems" from 2014 with an intake of 24 students. The department is also a recognized Research Centre (RC) by VTU from 2002 and is a recognized Quality Improvement Programme (QIP) center by the AICTE from 2011. With these activities on-hand, the overall objective of the department is to contribute significantly to the realization of the vision of BMSCE. The department is accredited by NBA for 6 years under TIER-I from 2017 to 2023. The department has a long tradition of excellence in educating, mentoring, and inspiring future technology leaders and researchers in the area of Electronics and Communication Engineering.

About IETE

Established in 1953, the Institution of Electronics and Telecommunication Engineers (IETE) is the national apex body of professional engineers dedicated to promote the science and technology of Electronics, Telecommunications, Computers, Information Technology and allied areas. IETE conducts various short-term courses, workshops and seminars to keep the aspiring professionals from Industry and R & D organizations involved in production and research in frontier areas of technology. The Bangalore center of IETE is one of the most active centers of the Institution striving to achieve the motto "*Saha vīryaṃ karavāvahai*" (let us do great things together).

About the course

The semiconductor industry has seen rapid progress since the invention of the transistor in 1947 CE. After the first integrated circuit was manufactured and demonstrated in 1958 CE by Kilby, the advancement in technology has opened up very many new areas. In the initial days, the number of transistors per unit area on a silicon chip roughly doubled every 18 months, famously known as the Moore's law. This increase in the number of transistors posed a challenge for design and test of billions of transistors, which has been overcome to a large extent. But, as we stand today, it is becoming increasingly costly to keep the Moore's law going; raising concerns as to whether the semiconductor industry is saturating.

In this situation, this value-added course is conceived to expose the participants to the challenges and opportunities that exist in the semiconductor industry, including the start-up space. The course is ideal for second and third year undergraduate students, post-graduate students and research scholars who want to contribute to the growth of the semiconductor industry. This course is also relevant for faculty who are interested in training industry-ready graduates through teaching and research.

Schedule

There will be two sessions per day of two-hours duration each, beginning at 11:00 AM and 2:00 PM respectively on the following days:

Date/Time	Session
10th Aug 11:00 AM	Inauguration by **Narendra Kumar Mohapatra** CEO, Electronics Sector Skills Council of India followed by *Data Driven Robots* **Sagar Gubbi**, Research Scholar, Indian Institute of Science, Bengaluru
10th Aug 2:00 PM	*Low Power Optimization for Digital Circuits* **Sabyasachi Nag**, CEO, Azventa Technologies
11th Aug 11:00 AM	*An Overview of System on-Chip Design* **Satya Sai Evani**, Senior Staff Engineer, Audience
11th Aug 2:00 PM	*Essentials of Analog Design* **Siddharth Deo**, Synopsys, Hyderabad
12th Aug 11:00 AM	*Design for Test in Integrated Circuits* **Dr. Suraj Sindia**, Researcher, Intel Corporation
12th Aug 2:00 PM	*Electronic Design Automation: An Algorithmic Perspective* **Dr. Srinath R. Naidu**, Associate Professor, Amrita Vishwa Vidyapeetham, Bengaluru
13th Aug 11:00 AM	*Towards Hyper-Connected Solutions and a Sustainable Energy World* **Tejas Tallam**, Director, Fabritronicx Electronics
13th Aug 2:00 PM	*Product Prototyping using IoT* **Ganesh Shankar**, Founder & CEO, FluxGen Technologies
14th Aug 11:00 AM	*MEMS Based Sensors and Actuators* **Dr. Habibuddin Shaik**, Associate Professor, Nitte Meenakshi Institute of Technology
14th Aug 2:00 PM	*Recent Developments in Battery Technology* **Dr. K. Yellareswar Rao**, Asst. Prof., Vignan's Institute of Information Technology (Vizag) followed by **Valedictory function**