

## SARANATHAN COLLEGE OF ENGINEERING, TIRUCHIRAPPALLI

Saranathan College of Engineering was founded by philanthropist Vidya Seva Ratnam Shri K. Santhanam in the year 1998 and was named after the great educationist Prof. V. Saranathan. The campus is located on Trichy – Viralmalai – Madurai highway on an area of 21 acres with a built up area of 2,60,000 sq.ft.. Seven U.G programmes and five P.G programmes are offered. All the programmes are affiliated to the Anna University, Chennai and have the approval of the AICTE, New Delhi. All eligible six UG programmes are accredited by NBA.

### ABOUT THE DEPARTMENT

Department of Instrumentation and Control Engineering (ICE) was started in the year 2003 and accredited by NBA. It is equipped with modern facilities besides conventional infrastructures. The department has well qualified experienced faculty and supporting staff. The department has received grants from central and state government organizations like DST, AICTE and TNSCST for carrying out research work and organizing National Conferences / Workshops / Seminars. The Department has Memoranda of Understanding with two leading companies, M/s National Instruments, Bangalore, India and Yokogawa India Ltd., Bangalore, India.

### OBJECTIVE OF THE WORKSHOP

The objective of the workshop is to equip the participants with a technical know-how on the scientific and research-oriented knowledge on Nano sensors for medical applications. This program aims to provide hands on experience to the faculty, research scholars and students in the field of modeling, design and simulation of nano sensors. The coupling of sensor technology with nanotechnology, microelectromechanical systems (MEMS), flexible electronics, smart phones, and wireless sensor networks are providing great opportunities for improving health care. This workshop will review new technologies, products, and research in medical sensors and their applications in improving health care efficiency. This workshop is designed to provide the attendees with a broad view of industrial applications of nanotechnology through a concentrated program that includes both lectures and hands-on experiences.

## ABOUT THE INSTITUTION OF ENGINEERS (INDIA)

The Institution of Engineers (India) or IEI is the largest multidisciplinary professional body that encompasses 15 engineering disciplines and gives engineers a global platform from which to share professional interest. IEI has membership strength of over 0.8 million. Established in 1920, with its headquarters at 8 Gokhale Road, Kolkata - 700020, IEI has served the engineering fraternity for over nine decades. In this period of time it has been inextricably linked with the history of modern-day engineering.

In 1935, IEI was incorporated by Royal Charter and remains the only professional body in India to be accorded this honour. Today, its quest for professional excellence has given it a place of pride in almost every prestigious and relevant organization across the globe. IEI functions among professional engineers, academicians and research workers. It provides a vast array of technical, professional and supporting services to the Government, Industries, Academia and the Engineering fraternity, operating from 123 Centres located across the country. IEI provides grant-in-aid to its members to conduct research and development on engineering subjects.

IEI conducts Section A & B Examinations in different Engineering disciplines, the successful completion of which is recognized as equivalent to Degree in appropriate field of Engineering of recognized Universities of India by the Ministry of Human Resources Development, Govt. of India. Every year as many as 80000 candidates appear for these exams. For details, please see: [www.ieindia.org](http://www.ieindia.org)

### ABOUT TIRUCHIRAPPALLI LOCAL CENTRE

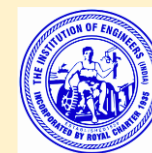
Tiruchirappalli Sub-Centre of IE (I) was formed in 1973 and was elevated as Local Centre in 1987 after the membership crossed the 500th mark. Presently, the membership is more than 2000. Our Local Center is functioning in its own premises located in BHEL campus on the land leased by BHEL, Tiruchirappalli. The building was declared open by Shri P.S Gupta, CMD, and BHEL in August 1990. The institution houses a library having more than 5000 books from various divisions for the benefit of students and members. Our Centre celebrated its Silver Jubilee during the year 1998 to mark the completion of 25 years of its formation and its meritorious service to the Engineering community. The Local Centre has a very close liaison with leading engineering organizations, professional Institutions and sister professional bodies in the conduct of Technical activities. Tiruchirappalli Local Centre stands Second in our country, among all Local Centers based on the level of activities. We have been regularly receiving additional incentives and appreciation letters of the President and other top people of our institution, for the same. For details, please see: <http://ieitiruchi.org/>

## The Institution of Engineers (India)

**“100 years of Relentless Journey towards  
Engineering Advancement for Nation  
Building”**

### All India Workshop on *“Nanosensors for Medical Applications”*

Organized by



The Institution of Engineers (India)

**Tiruchirappalli Local Centre**

in association with

**Saranathan College of Engineering,  
Tiruchirappalli**



**4-5 March, 2020**

**VENUE**

**Department of Instrumentation and Control  
Engineering,  
Saranathan College of Engineering,  
Venkateswara Nagar, Panjappur,  
Tiruchirappalli,  
Tamil Nadu – 620 012**

Topics proposed to be covered in this workshop:

- I. Sensors applied in biomedical applications
- II. Micro/Nano fabrication techniques
- III. Role of engineering in biomedical applications
- IV. Design and simulation of biomedical sensors using Intellisuite
- V. Signal processing of nano sensors using LabVIEW

Resource persons from academic institutions, medical practitioners and industries will be invited.

#### Registration Fees (Inclusive of GST as applicable):

All delegates attending the workshop must register by filling the registration form and by paying registration fees as follows:

Category	Early bird registration (Rs.)	From 26th Feb. 2020 onwards (Rs.)
IEI Members (Industry)	1000	1200
Non IEI Members (Industry)	1500	1700
Research Scholars / Faculty	1200	1400
Students	600	800

- Registration fee includes workshop kit, Tea & working lunch during sessions. Presentation material will be shared through Google drive for limited period for downloading by participants.
- The Registration form in the prescribed format to reach us on or before 28.02.2020.
- The number of participants will be limited to 60. Hence participants are advised to register early.
- The registration form along with documents of payment should be submitted to the Hon. Secretary personally or by post / courier on the following address:  
Hon. Secretary,  
The Institution of Engineers (India)  
Tiruchirappalli Local Centre,  
BHEL Main Office Road, BHEL,  
Tiruchirappalli – 620014

#### Payment:

The payments can be made by

- A crossed Demand Draft / MICR Cheque, drawn in favour of "The Institution of Engineers (India), Tiruchirappalli Local Centre", payable at Tiruchirappalli.
- Depositing the amount in our SB A/c No.10891417887 of The Institution of Engineers (India), Tiruchirappalli. The deposit slip will form the document for payment and will be exchanged with the receipt at the registration counter.

**Our Bankers:** State Bank of India, Heavy Electricals, Kailasapuram, Tiruchirappalli – 620014, IFSC Code: SBIN0001363, Branch code: Last six characters of IFS code represent branch code, MICR code: 620002004

#### Travel & Accommodation:

- The delegates will have to make their own arrangements for travel, boarding & lodging.

### NATIONAL ADVISORY COMMITTEE

**Chief Patron** Shri. S. Ravindran, Secretary, Saranathan College of Engineering, Tiruchirappalli  
**Chairman** Dr. T. M. Gunaraja, FIE, President, IEI

**Co-Chairman** Dr. D. Valavan, Principal, Saranathan College of Engineering, Tiruchirappalli  
Mr. Santoshkumar S Mutha, FIE, Chairman, ETDB, IEI

**Convener** Dr. M. Shanmugavalli, Professor, Department of Instrumentation and Control Engineering, Saranathan College of Engineering, Tiruchirappalli

**Members:** Prof (Dr) T S Kamal, FIE, Member, ETDB, IEI  
Mr Subhash Chandra Rudra, FIE, Member, ETDB, IEI  
Dr (Ms) Gunnu Padmavathi, FIE, Member, ETDB, IEI  
Mr T P Raveendran, FIE, Member, ETDB, IEI  
Mr Badduru Brahma Reddy, FIE, Member, ETDB, IEI  
Prof (Dr) G S Mundada, FIE, Member, ETDB, IEI  
Dr. S. Dharmalingam, Former General Manager, BHEL, Tiruchirappalli  
Mr. A. Anand, MIE, Hon. Secretary, Tiruchirappalli Local Centre, IEI

### ORGANISING COMMITTEE

**Chairman** Dr. N Kumaresan, FIE, Chairman, Tiruchirappalli Local Centre, IEI  
**Organizing Secretary** Dr. N. Sivakumaran, MIE, Professor, NIT, Tiruchirappalli.  
**Members** Er. S Lakshmanan, Manager, BHEL, Tiruchirappalli  
Dr. S. M. Girirajkumar, Prof. & Head, Department of ICE, Saranathan College of Engineering, Tiruchirappalli

### TECHNICAL COMMITTEE

**Chairperson** Dr. M. Umapathy, Prof., Dept. of Instrumentation and Control Engg., NITT  
**Members** Dr. G. Uma, Prof., Dept. of Instrumentation and Control Engg., NITT

### CONTACTS

<b>Name</b>	Mr. A Anand (IEI)	Dr. M. Shanmugavalli Dr. S. M. Girirajkumar, Prof. & Head
<b>Phone</b>	9442236476	9865675481, 9442074794
<b>Email</b>	a.anand@bhel.in	shanmugavalli-ice@saranathan.ac.in
<b>Address</b>	Hon. Secretary, Tiruchirappalli Local Centre- IEI, BHEL Main Office Road, BHEL, Tiruchirappalli 620 014	Saranathan College of Engineering, Panjappur, Tiruchirappalli - 620 012.

### ALL INDIA WORKSHOP

on

*"Nanosensors for Medical Applications"*

4-5 March, 2020, Tiruchirappalli

### REGISTRATION FORM

1. Name (In block letters):

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2. Designation:.....

3. Organization:.....

4. Address for Communication:

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5. Mobile:.....Land Line:.....

6. E-mail id:.....

Registration category (Tick the boxes as per your

category). Delegate from

☐ IEI members ☐ Non IEI members

☐ Academic institutes – Faculty/Research Scholars

☐ Industries & Govt. organizations

☐ Students

#### Payment Details:

☐ DD/Cheque No .....for Rs.....

Dt.....for Rs.....

☐ Deposit slip for online payment Dt.....

for Rs.....

Beneficiary name: The Institution of Engineers (I), Tiruchirappalli Local Centre. Bank Account no.: 10891417887, IFSC CODE: SBIN 0001363, State Bank of India, Heavy Electricals, Kailasapuram, Tiruchirappalli 620014.

Signature of the Applicant

**Note:** Please send this form along with DD/Cheque to "The Honorary Secretary, The Institution of Engineers (India), Tiruchirappalli Local Centre, BHEL Main Office Road, Tiruchirappalli – 620014" by post. In case of online payment, please send the scanned copy of this form along with deposit slip for online payment by email to [ieitlc1973@gmail.com](mailto:ieitlc1973@gmail.com) with a copy to [shanmugavalli-ice@saranathan.ac.in](mailto:shanmugavalli-ice@saranathan.ac.in)