#### SCIENCE AND ENGINEERING RESEARCH BOARD

KARYASHALA On Microgrids design, control, applications and challenges (Duration: 5–11<sup>th</sup> March, 2024)

#### **REGISTRATION FORM**

Name:
Designation:
Organization:
Qualification:
Correspondence Address:
T 1 (0)
Tel. (O) (M)
E-Mail:

### Signature of Candidate

### Signature of Principal/HoD/Supervisor

**Note:** The participants for the High-End Workshops will be Ph.D. and M.E./M.Tech. research scholars only. Email duly signed registration form at: bikram.ee@nita.ac.in

#### **CHIEF PATRON**

Prof. S. K. Patra

Director, NIT Agartala

## PATRON

Dr. R.N.Ray HoD & Associate Professor Department of Electrical Engineering

### **COORDINATORs**

Dr. Bikram Das, Assistant Professor, Grade-I, Electrical Engineering Dept. NIT Agartala & Dr. Arvind Kumar Jain Associate Professor, Electrical Engineering Dept. NIT Agartala

### ADDRESS FOR CORRESPONDENCE

Dr. Bikram Das, Assistant Professor Grade-I, Electrical Engineering Dept. NIT Agartala Email: bikram.ee@nita.ac.in Contact No: 9436459126

### **IMPORTANT DATES**

- Last date of receipt of application: 25<sup>th</sup> February 2024.
- Notification about selection: by email







DST –SERB sponsored KARYASHALA (High - End Workshop) on Microgrids design, control, applications and challenges

One week

## (Duration: 5–11<sup>th</sup> March, 2024)



## **ORGANIZED BY**

Department of Electrical Engineering National Institute of Technology, Agartala, Tripura-799046 www.nita.ac.in

### Speakers

The speakers for this workshop will be from IITs, NITs and industries.

### **Target Participants**

The proposed workshop is open to Ph.D. research scholars/postgraduate students from all institutes who are working in the area of Electrical Engineering, Electronics & Communication Engineering and Electronics and Instrumentation Engineering.

## **About the Institution**

The National Institute of Technology Agartala is an Institute of National importance and fully funded by Government of India (GoI). Institute offers UG, PG and PhD courses in diversified fields of engineering, science and management along with Post-Doctoral Fellowships. The Institute is committed to develop technical manpower with through pursuit of excellence in research, consultancy and skill development.

## **Registration Fee & other facilities**

- ✓ There is **NO REGISTRATION FEE** for the participants.
- $\checkmark$  The event is limited to maximum of 25 participants.
- ✓ T.A./D.A. will be provided to the participants, as per the SERB norms.
- ✓ Food and accommodation will be provided to all the participants at free of cost.
- ✓ The selection of the eligible participants for this High-End Workshops will be done based on the recommendations of the Selection Committee.

# About the Department

The Department of Electrical Engineering is established in 1965 under the aegis of Tripura Engineering College (TEC), a state engineering college of Tripura, which is upgraded as National Institute of Technology on 1st April 2006. The department offers a four years B.Tech. program in "Electrical Engineering" with intake capacity of 90. The department offers 2 years M.Tech. programs in four specializations namely Power System Engineering, Power Electronics & Drives, Instrumentation engineering, and Integrated Energy Systems.

The department is actively involved in research and also running Ph.D. programs in all fields of electrical engineering. The research interests of the faculty members include a wide range of sub-disciplines of Electrical Engineering. The research activity of the department includes fundamental research, sponsored and consultancy projects, and is carried out with the active participation of the students, faculty, and research staff.

### How to Reach NIT Agartala

The Institute is 4 km away from Jirania on Assam-Agartala Highway (NH-44) and about 20 km away from Agartala city. Agartala is well connected by Rail Road and Air. Pre-Paid Taxi and auto services are available from Agartala Airport to the Institute.

## **Objectives of the Program**

The primary objectives of the workshop are to enable the participants to:

• Understand the theory and concepts of power electronics converters for microgrid applications.

• Understand the platform and simulation tools to for implementation of Grid, Microgrid connected converters.

• Understand the controller concept, designing and development of controller.

• Detail analysis of operation and control of microgrid and its related issues.

• Detail analysis of operation and applications of microgrid and its related issues.

• Learn from the emerging challenges and operating experience of utilities in connection to Microgrid.

• Realization of further need for research and development in this rapidly growing area