

About Electronics & ICT Academy at PDPM IITDM Jabalpur



The Ministry of Electronics and Information Technology (MeitY), Government of India, instituted Electronics and ICT Academies in 2015. In the second phase, the academy at PDPM IITDM Jabalpur aims at scalable training programmes in niche areas of Electronics and ICT for the development of the required knowledge base, skills, and tools to unleash the talent of the Indian population. The Academy is identified by the MeitY as a hub of activities for capacity building through training, internships, research, and consultancy programmes in fundamental and advanced topics in electronics, information and communication technologies. The Academy conducts customized academic programmes for students, the corporate sector, and researchers.

About MNNIT Allahabad & Department of Mechanical Engineering

Motilal Nehru National Institute of Technology (MNNIT) Allahabad, was formerly known as Motilal Nehru Regional Engineering College (MNREC). It was established in 1961 as a joint enterprise of the Central Government of India and the State Government of UP in accordance with the scheme of establishment of RECs. On June 26, 2002, it was transformed into the National Institute of Technology, fully funded by the Government of India, with a commitment to quality and excellence in academic pursuits. It offers 9 UG and 22 PG courses in engineering, besides MBA, MCA, MSc, and Doctoral programmes. The Department of Mechanical Engineering is one of the oldest departments and was established in 1961. Presently, it offers two UG, five PG, and Doctoral programmes in different areas.

Faculty Development Programme on

Technological Development in Advanced Manufacturing – Challenges, Scope and Applications (Online mode)

Date: September 01-10, 2025

The course provides a deep understanding of technological development in various advanced manufacturing processes through experimental, simulation, and ML-based approaches with relevant applications. Participants will also gain hands-on experience and learn to apply different control strategies, metrology, inspection methods, and simulation tools used in precision and ultraprecision manufacturing for improved and research-oriented innovative solutions.

Who can attend:

Faculty members from colleges, universities, technical, and professional institutes can attend. Students, fresh graduates, researchers, and industry personnel working in allied disciplines can also attend.

Important Dates:

Last Date of Online Registration: **August 31, 2025**

FDP Dates: **September 01-10, 2025**

Coordinators:

Prof. A. K. Dubey & Dr. Tej Pratap

MED, MNNIT Allahabad

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**Jointly Organized by
Motilal Nehru National Institute of
Technology (MNNIT) Allahabad**



and

**Electronics and ICT Academy
IITDM Jabalpur**



*An Initiative of the Ministry of
Electronics and Information Technology,
Government of India*



Faculty Development Programme

on

Technological Development in Advanced Manufacturing – Challenges, Scope and Applications (Online mode)

Date: September 01-10, 2025

Resource Persons

- Prof. Amit Rai Dixit, IIT-ISM Dhanbad
- Prof. Meghanshu Vashista, IIT BHU
- Prof. Karali Patra, IIT Patna
- Prof. Mukul Shukla, MNNIT Allahabad
- Prof. Mamilla Ravi Sankar, IIT Tirupati
- Prof. Puneet Tandon, PDPM IITDM Jabalpur
- Dr. Chandrakant Kumar Nirala, IIT Ropar
- Dr. Ashwani Pratap, IITDM Kurnool
- Dr. Tej Pratap, MNNIT Allahabad
- Dr. Divyansh Patel, IIT Bhubaneswar

Coordinators

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Course Contents

- Technological Development in Advanced Manufacturing.
- Conventional Micromachining Technology.
- Condition Monitoring in Micromachining.
- Development in Additive Manufacturing.
- Laser-Assisted Machining Processes
- Engineered Surfaces and their Applications.
- Surface-Finishing of Manufactured Components.
- Advanced Metrology and Inspection of Precision Components.
- Software and Control Strategies in Manufacturing.
- ML-based Process control in manufacturing.

Hands-On Sessions

- Molecular Dynamics Simulations
- Metrology and Inspection Methods
- Simulation of Hybrid Machining Processes
- Image Analysis for Surface Characterization
- 3D Roughness Parameters and Measurements
- Micro-fabrication facility demonstration

Programme Features

- Rigorous training for theoretical and practical knowledge on the Technological Development in Advanced Manufacturing and related areas.
- Opportunities to connect with experts in the field.
- Instructor-led, rigorous hands-on sessions.
- Certificate on successful completion with full access to the course material.

Registration Details

- Registration link – Please fill out the registration using the following link:
<https://forms.gle/ueUzwArQHqyXgogxq5>
- Registration fee: INR 500/ (Online participation)
- Last Date for Registration: **August 31, 2025**

Online Payment Details

• Internet banking

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|------------------|----------------------------|
| Beneficiary Name | PDPM IITDM Jabalpur |
| Bank Name | Indian Bank |
| A/C No. | 50018692852 |
| IFSC Code | IDIB000M694 |

- **UPI ID:** **iiitdmj@indianbk**
- **QR Code:**

