

CHIEF PATRON

Prof. Manish Bhalla
Vice Chancellor, DYPIU, Akurdi

ORGANIZING CHAIRMAN

Dr. Anupama V. Patil
Director, SEMR, DYPIU

CONVENER

Dr. Shailesh Ghodke
HOD and Associate Professor
Chemical Engineering
SEMR, DYPIU

CO-ORDINATORS

Dr. Sunita Patil
Assistant Professor
Chemical Engineering, SEMR, DYPIU
Dr. Kirti Zare
Assistant professor
Chemical Engineering, SEMR, DYPIU

ADVISORY COMMITTEE

1. **Dr. Sunil Damhare, IQAC Director**
2. **Dr. Priya Charles, HOD-Semiconductor**
3. **Dr. Ganesh Jadhav, HOD - Mechanical**
4. **Dr. Pravin Gorde, HOD - Civil**

ORGANIZING COMMITTEE

- Dr. Utkarsh Maheshwari
- Dr. Sangeeta Benni
- Mr. Umesh Narkhede

RESOURCE PERSONS

- **Dr. Shirish Manchalwar**
Senior Research Scientist
Honywell Automation, Pune
- **Mr. Adarsh Sambare**
Data Scientist, Reliance Industries,
Navi Mumbai.
- **Dr. Tushar Kute**
Data Scientist, MITU, Pune
- **Mr. Asif Shaikh**
Senior Business Analyst,
Bapco Energies, Bahrain
- **Mr. Arunkumar Radhakrishnan**
Senior Education Manager,
Autodesk, Pune

SUSTAINABLE DEVELOPMENT GOALS MAPPED



FIVE DAYS ONLINE FACULTY DEVELOPMENT PROGRAMME

on

“Applications of Computational Techniques in Process and Manufacturing Industries”

15-12-2025 to 19-12-2025

Organized By

**Department of Chemical Engineering
School of Engineering, Management and
Research, D Y Patil International University**

Approved By IICHe



**D Y Patil International University
3rd Floor, J Block Sector 29, Akurdi,
Pune, Maharashtra. Pin - 411044**

www.dypiu.ac.in

ABOUT THE UNIVERSITY

At D Y Patil International University, we believe that education must evolve with time. In today's fast-paced world, where industries are constantly redefined by technology, sustainability, and creativity, our university offers a dynamic and interdisciplinary learning environment that goes beyond the classroom. We emphasize practical learning, critical thinking, innovation, and character-building across all programs.

ABOUT THE DEPARTMENT

B.Tech program in Chemical Engineering at DYPIU is a four-year full-time course. This program has been designed in consultation with academicians, researchers and representatives from various industries. Chemical engineering is a dynamic and multifaceted discipline that provides distinctive attributes and prospects for individuals contemplating it as a professional trajectory. Department offers specialization in Energy & Environment and Computer Aided Chemical Engineering

ABOUT THE FDP

This FDP is designed to enhance the knowledge and skills of educators, researchers, and industry professional with the modern computational tools and methods. Such a program typically focuses on the integration of advanced techniques like ASPEN, UNISIM, MATLAB, Computational Fluid Dynamics (CFD), Machine Learning, and Optimization Algorithms to solve complex industrial problems. By fostering interdisciplinary learning and collaboration, the program equips faculty members to incorporate computational approaches into their teaching and research

DEPARTMENT VISION

To provide quality education and create competent chemical engineers by encouraging innovation and creativity in the multidisciplinary sectors.

DEPARTMENT MISSION

- To provide a contemporary curriculum that integrates core Chemical Engineering and interdisciplinary knowledge
- To foster an innovative culture for problem solving in chemical and allied fields
- To strengthen industry partnerships to improve practical competencies and employability of graduates

FDP OBJECTIVES

- Encourage participants to apply modern computational techniques in innovative product design projects and process optimization.
- Provide insights into how these tools are applied in process industries (chemical, petrochemical, food, pharmaceuticals) and manufacturing industries (automotive, aerospace, heavy machinery).

FDP OUTCOMES

- Participants gain proficiency in computational tools and software.
- Ability to apply simulation, modeling, and optimization techniques to real-world industrial problems.
- Strengthened academia-industry linkages through exposure to case studies and industrial applications.



FDP CONTENTS

Day 1: Process Design and Development, Mathematical modelling

Day 2: Machine Learning, deep Learning and natural language processing

Day 3: Generative Design for Process Equipment, Computational Stress & Fatigue Analysis for Plant Equipment

Day 4: Applications of AI and Deep Learning in Refinery

Day5: Manufacturing Operations Management Assessment & Valedictory



IMPORTANT DATE

Last Date of Registration :
14th December 2025



REGISTRATION FEE DETAILS

- No participation fees for the FDP
- E-certificates will be issued after attending all sessions, submitting the feedback form and quiz



REGISTRATION LINK

Session Time - 2:00 PM to 4:00 PM.

<https://forms.gle/1dtL4RQZW5y9fbKk7>



JOIN WHAT'S APP LINK

<https://chat.whatsapp.com/EW3fKt7N3qGBYajUTGQIaC?mode=hqrt1>