

Semester II of AY 2022-23

■ Vision of the Department

To lead as a center of quality technical education and research in the field of Mechanical engineering to serve the needs of the society

Mission of the Department

- M1: To integrate and apply scientific and engineering knowledge to develop innovative systems for sustainable development of the society
- M2: To inculcate research culture amongst students by offering multidisciplinary projects from industrial and societal background
- M3: To inculcate professional ethics along with contemporary technical skills for overall development of students

■ Expert Lectures Organized

- Er. Pramod Daspute, Certified Energy Auditor from the Government of India, delivered an expert talk on "Energy Audit - Case Studies" on 16th February 2023.
- Mr. Sanjay Kothekar, CEO of Access CADD Nashik, conducted a session on "Career Opportunities in Engineering Industry as a CAD CAM CAE Professional" on 17th February 2023.
- Mr. Vishal Patil, Business Development Manager at GATE Forum Nashik, conducted a session on "GATE Exam Preparation" on 20th February 2023.
- Mr. Gokul Pawar, Project Manager at Mechwell Industries Ltd, Nashik, conducted a session on "Engineering Design Tools and Techniques" on 4th March 2023.
- Mr. Suyog Zute, Deputy Executive Engineer at Nashik Thermal Power Station, delivered an expert talk on "Super Critical Power Generation Technology" on 9th March 2023.
- Mr. Mahesh Tachale, Tech Support Engineer II at Barclays Pune, conducted a session on "Ansys Innovation" on 17th March 2023.
- Mrs. Vaishali Lele, Senior Training & Certification Manager at PDRL Pvt Ltd Nashik, delivered an expert talk on "Drone Technology" on 18th March 2023.
- Mr. Ankit Gujrathi, Research Scientist at Gexcon India Pvt Ltd, conducted a session on "Optimization of Solar Dryer Design using Ansys Fluent" on 18th March 2023.
- Dr. G. N. Kulkarni, Director at PCCOE, Pune, conducted a session on "Solar Thermal Technology" on 17th April 2023.

- Dr. Sanjeev Suryawanshi, Professor at SSVPS BSD College of Engineering Dhule, conducted a session "Solar Thermal Technology: Lifestyle for Environment" on 19th April 2023.
- · Dr. Anand Rao, Professor at IIR Bombay, conducted a session on "Climate Change & Carbon Sequestration Technology" on 20th April 2023.
- · Dr. Vishwadeep Handikhekar, Senior Engineer at Monorail, Mumbai, conducted a session on "Artificial Intelligence and Machine Learning for Mechanical Engineering" on 21st April 2023.
- Mr. Ganesh Ushir, CEO of Meghapushpa Energy Tech Pvt. Ltd., Nashik, conducted a session on "Role of Fluid Power Engineering in Today's Industrial Automation " on 25th April 2023.
- · Mr. Harsh Deodhar, Mentor and Advisor at AH Ventures Mumbai, conducted a session on "Business Model Canvas" on 6th May 2023.
- Mr. Santosh Jadhav, Deputy Manager at Volvo Eicher Commercial Vehicle, conducted a session on "Component Design Process and Its Life by Virtual" on 6th May 2023.
- · Mr. Suchit Tiwari, CEO of Cognifront, conducted a session on "Web Based Manufacturing" on 9th May 2023.
- Mr. Yugandhar Tupe, Founder & CEO of Sauryouth Nashik, conducted a session on "Conservation of Energy" on 15th May 2023.

FDP/STTP/Workshops Organized or Attended:

- From 13/03/2023 to 17/03/2023, a One-week FDP Program Blended Mode on CFD using ANSYS Fluent and Multibody Dynamics was organized. Resource persons: Mr. Rohit Sangwan, Mr. Ravindra Bucherla, Sr. Application Engineer. Contact: 8920479290. Location: ARK Infosolution Pvt. Ltd., Pune.
- On 10/03/2023, Women's Day Celebration was organized by the Mechanical Engineering Student Association for the girls and ladies staff of Mechanical.
- A National level technical event named "Mechevan 2023" occurred on 28/04/2023 with 150 attendees which was organized by the Mechanical Engg Department.
- · Farewell of Final Year Students was conducted on 20/05/2023, with 270 attendees.

Department Faculties have attended around 28 FDP, STTP & Workshops at State, National and International level.



■ Publications in International Journals:

- Prof. Kadbhane Snehal Vasant published a paper titled "Computational analysis on combined convective heat transfer of flow through long vertical duct and parameters affecting accuracy of computational results and thermal performance" in the Journal of Basic Science/Fangzhi Gaoxiao Jichukexue Xuebao, ISSN: 1006-8341, indexed in SCOPUS.
- Dr. Patil Vijay Sahebrao published a paper entitled "Experimental investigation of CO2 level in the closed room including the effect of ventilation and use of snake plants" in Sadhana, ISSN / eISSN: 0256-2499 / 0973-7677, indexed in SCI.
- Dr. Matsagar Vilas Karbhari published a paper titled "Ni-Cr Based Self Lubricating Composite Performance for High Speed Engineering Application" in Tribology in Industry, ISSN: 0354-8996 (print version); 2217-7965 (online version), indexed in SCOPUS.
- Dr. Patil Atulkumar Sahebrao published a paper entitled "Experimental Investigation of Micro-Textured Piston Ring and Cylinder Liner Pair at Mid Stroke Operating Conditions" in the International Journal of Engineering Trends and Technology, ISSN: 2349-0918 ,E-ISSN: 2231-5381, indexed in SCOPUS.
- P.R.Beldar published the paper titled "Design and Development of Renewable Energy Battery Storage System" in the International Journal for Research in Applied Science & Engineering Technology (IJRASET), with ISSN 2321-9653, Volume 11 Issue V, May 2023.
- Prof. Sonali Mate authored a paper titled "Design of Bumper for sudden impact reduction in fourwheeler" published in the International Journal for Research Application & Management (IJREAM), with ISSN 2454-9150, Vol. 09, Issue 01, April 2023.

■ Industrial Visits:

- Industrial visit to NTPS Eklahare Nashik was arranged for B.E. (A) students on 28-03-2023 to demonstrate the thermal power station, its construction, working, layout, parameters, components, and its effect on the environment. Snehal Vasant Kadbhane and Ashok Devgude assisted the students during the visit, where they understood the thermal power station and its various aspects.
- Industrial visit to Jadhav Casting, located at D 1/24, MIDC Ambad, Nashik-422010, Maharashtra, India, was organized for S.E. All students on 21-04-2023 to study the process of sand casting. Prof. V. K. Matsagar, Prof. R. V. Bhaskar, Prof. N. V. Patil, Prof. S. D. Mate, Prof. M. V. Bhadak, and Prof. N. S. Dixit accompanied the students, who were able to explain the process of sand casting after the visit.
- Industrial visit to Unnatti Industries in Ambad, Nashik, was arranged for S.E. B students on 21-04-2023 to understand the basic procedure used for forming processes. N. V. Patil, S. D. Mate, and M. V.

- Bhadak guided the students during the visit, where they were able to understand forming processes practically.
- Industrial visit to Shalaka Shaft Pvt Ltd. at F67 MIDC Ambad Nashik was conducted for T.E. A students on 12-05-2023 to demonstrate Coordinate Measuring Machine (CMM) and different types of measuring instruments and gauges used in industrial applications. Amit D. Bhagure and Rohit V. Bhaskar accompanied the students, who were able to demonstrate the use of CMM and identify different instruments used in the industry with Go No Gauges and their applications.
- Industrial visit to Shalaka Shaft Pvt Ltd. at F67 MIDC Ambad Nashik was organized for T.E. C and B students on 15-05-2023 to demonstrate Coordinate Measuring Machine (CMM) and identify different types of measuring instruments and gauges used in industrial applications. Ganesh R. Rayjade and Rohit V. Bhaskar guided the students, who were able to demonstrate the use of CMM and identify different instruments used in the industry with Go NoGo gauges and their applications
- Industrial visit to Regional ST Workshop on Peth road, Nashik, was arranged for S.E. A students on 15-05-2023 to understand the basic components and systems used in engines. Dr. Vijay S. Patil accompanied the students, who were able to identify and compare different systems used in engines after the visit.
- Industrial visit to Kadwa Sahakari Sakhar Karkhana in Kadwa, Dindori, was conducted for B.E. A students on 15-03-2023 to study cogeneration in the sugar mill. Prof. S. V. Kadbhane guided the students during the visit, where they studied the cogeneration system.

Achievements:



Students of Mechanical Engineering received All India Rank 7 along with runner up prize in design, validation and Innovation in SAE BAJA a National level event organized by SAE INDIA in February 2023.

TECHNICAL NEWS LETTER: Semester-II AY 2022-23





Ms.Prajakta Ravindra Ghume, Mr. Adarsh Sanjay Shinde, Mr.Yash Jagdish Bhoware and Mr. Yuvraj Singh Bhavani Singh Naruka Rank 1st in Techno-Fest a National Level Project Competition organized by Late G.N Sapkal College of Engineering in May 2023

