### 2022-23

Student Section Advisor : Mr. Bobin Saji George

The chapter office bearers for the year 2022-2023 are as follows

- Pratyush Moni (Chair)
- Sneha Selvan (Vice chair)
- J. Arjun (Secretary)
- Kailas Nath (Technical Head)
- Aswin S.S. (Organising committee Head)
- Ebel Philip Varghese (Treasurer)

#### **ENERGON SERIES – ASME MBCET STUDENT SECTION**

As part of Energon Series of talk by ASME MBCET student section, a one-week long workshop on "Application of Computational Fluid Dynamics in fluid Flow Analysis" was conducted from 14-11-2022 to 18-11-2022 for students. As part of workshop a competition was arranged based on flow analysis.

Resource Person: Mr. Vaisakh S Nair, AP, ME

#### Summary

CFD engineers simplify fluid flow systems and play an important role in gauging the parameters that go into creating feasible products and solutions. Ansys Fluent is the industry-leading fluid simulation software known for its advanced physics modeling capabilities and industry leading accuracy. These problems include static/dynamic, structural analysis, heat transfer, and fluid problems, as well as acoustic and electromagnetic problems.

- 1. Introduction to Ansys Software
- Pre Processing to Post Processing
- Introduction to Modelling
- Introduction to Meshing
- Steps involved in Processing
- Results and Discussion
- 2. Getting started with engineering problem
- Problem definition
- Model construction and preprocessing steps
- 3. Processing
- Steps involved in analyzing the problem
- Understand the Input parameters
- 4. Post processing

- Result capture and discussions
- Post processing tools
- 5. TUTORIAL PROBLEM.

# DEPARTMENT OF MECHANICAL ENGINEERING

## ENERGON SERIES

0

APPLICATION OF COMPUTATIONAL FLUID DYNAMICS IN FLUID FLOW ANALYSIS



NOVEMBER 14 - 18, 2022



