SAEINDIA Student Chapter Activity Report

Mar Baselios College of Engineering and Technology, Trivandrum

Academic Year 2024–2025

The SAEINDIA Student Chapter at Mar Baselios College of Engineering and Technology (MBCET), Trivandrum, continues to be an active and vibrant platform for engineering students to engage with advancements in mobility technology and develop skills in line with industry expectations. Affiliated with SAEINDIA Southern Section, the chapter has successfully participated in several national-level events and knowledge-driven sessions during the academic year 2024–2025, promoting technical excellence and professional growth among its members.

One of the most notable activities undertaken by the chapter was its participation in the **Online Awareness Session for Embedded System 2025**, held on the 28th of February, 2025. This session, conducted by SAEINDIA Southern Section via Google Meet, was aimed at introducing the framework and expectations of the Embedded System 2025 national-level competition., the session covered the scope of embedded system design and its real-world applications.



Experts elaborated on the competition structure, technical requirements, and evaluation methodology. The participants gained a solid understanding of how embedded systems

integrate hardware and software to solve complex engineering problems, and how the upcoming competition would test these skills. The event not only sparked a strong interest in embedded technologies but also encouraged students to form interdisciplinary teams to pursue practical applications in IoT, automation, and real-time systems.

In addition to this technical session, members of the chapter had the opportunity to attend a highly inspiring **webinar on "Next-Gen Mobility: Levitation and Beyond"** conducted on the 23rd of December, 2024. The session featured **Mr. Prasanna Kadambi**, Co-Founder and CTO at Quintrans Hyperloop, as the guest speaker. A distinguished innovator in the domain of transportation technology, Mr. Kadambi shared his experiences and expertise in developing hyperloop systems—one of the most revolutionary concepts in modern mobility.



Mr. Kadambi explained the fundamentals of magnetic levitation, high-speed vacuum tube transport, and the entrepreneurial challenges faced in pioneering such futuristic solutions. His talk not only demystified complex technical concepts but also inspired the student audience to think beyond conventional systems and engage with innovation-driven projects. The session provided insights into real-world engineering challenges and encouraged students to explore startups and R&D as viable career paths.

The chapter also participated in another impactful event, the **Online Awareness Session for the Reverse Engineering 2025 competition**, which was conducted on the 14th of March, 2025. This session, the third edition of its kind, introduced students to the national-level competition focused on dismantling existing mechanical systems to understand, analyze, and



re-engineer them. Conducted over a short but impactful session, the awareness program provided participants with detailed information on how to approach the reverse engineering process systematically, emphasizing CAD modelling, sustainability, and innovation. The event was particularly effective in fostering analytical thinking and hands-on design among mechanical and production engineering students.