

#### **BTECH ORIENTATION - MIT PRAVESH 2024**

MIT Pravesh 2024- The four-day MIT Orientation program for the newly joined BTech students was centrally held from 16 to 19 July 2024 at MIT, Manipal. The annual event aimed to provide information about the academic processes, regulations, co-curricular activities, hostel facilities, and general guidelines essential for the newly admitted students at MIT, Manipal.



MIT Pravesh 2024 was formally inaugurated with a floral tribute to the Founder Late Dr T M A Pai followed by the Lighting of the Lamp by Lt Gen (Dr) M D Venkatesh, Vice Chancellor of MAHE Manipal on 16 July 2024. Four distinguished alumni of MIT, Manipal were invited as chief guests for four days during the orientation.

ENGINEER'S DAY & PROF P V BHANDARY ORATION

The Engineer's Day Celebrations and Prof P V Bhandary Memorial Oration 2024 took place on 16 September 2024 at MIT Manipal. This event paid tribute to Bharat Ratna Sir M Visvesvaraya, the father of Indian engineering, while also commemorating the contributions of the late Prof P Varadaraya Bhandary, former Principal of MIT Manipal and Pro Vice Chancellor (Tech) at MAHE.

Padma Shri awardee, Dr Prahlada Ramarao, a distinguished missile scientist and former Director of DRDO, delivered the Engineer's Day special talk. He presented SWOC analysis of engineers in general and emphasized the role of engineers in building the nation. He also highlighted the importance of lifelong learning.



The Prof P V Bhandary Memorial Oration was delivered by Dr Hari Subramanian, Senior Fellow and Chief Scientist in Deep Brain Stimulation (DBS)

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# What is seemingly impossible can be made possible. Recognition will come sooner or later.



# Dr. T. M. A. Pai

# MANNUPALLA TO MANIPAL - AN EPIC SAGA

#### DR T M A PAI'S PERSONAL CONNECTIONS BEYOND THE BORDERS - AUGMENTING THE GROWTH OF MANIPAL

Dr T M A Pai's success as a visionary leader is marked by an enduring commitment to the health, banking, and educational needs of the community. His efforts have long been recognized, yet what truly sets him apart is the story of how he wove a network of person-to-person connections, extending beyond borders and cultures during those days, to realize his dreams of transforming the community around. In his pursuit of nurturing his dreams into reality, Dr T M A Pai drew people to him from far and wide.

Among these remarkable figures was Harry Plissner, an American businessman from Miami Beach, Florida, who heard of Dr Pai's efforts through journalist M V Kamath in 1958. Intrigued and inspired, Plissner reached out to Dr Pai with a generous offer: to send books to enrich the libraries at Manipal's budding colleges. At a time when procuring quality educational resources in India was challenging and expensive, this offer was nothing short of transformative and Dr T M A Pai embraced the idea with all his heart.

Plissner's commitment was tireless. Over the following months, he penned hundreds of letters to universities across America, asking them to donate books on medicine, engineering, and other professional subjects for Manipal's students. His efforts bore abundant fruit. By the end of that year, five tons of books—nearly 10,000 volumes—arrived on Indian shores, marking the beginning of a precious intellectual foundation for Manipal. Soon after, another five tons followed, each book a silent witness to the friendship and shared vision between Dr T M A Pai and Plissner.

In February 1959, Plissner flew to India at his own expense to receive a heartfelt welcome at Manipal. At a special ceremony, he was awarded an Honorary Fellowship from the Academy of General Education, a gesture that honored not just his generosity but the spirit of unity he and Dr Pai shared. The books Plissner collected, nearly 18,000 in total, became a cornerstone of the college libraries, nurturing generations of students who would go on to fulfil Dr T M A Pai's dream of an educated and empowered society.

For Plissner, this mission was about more than books; it was a testament to his belief in the power of humanity's shared hopes. Inspired by Dr Pai, he launched a campaign in Milwaukee's Allis-Chalmers factory, leading to further book donations for Mahatma Gandhi Memorial College in Udupi. When Dr T M A Pai and Mr Ramesh Pai travelled to New York in 1959, Plissner invited them to Miami as his guests. Their arrival was marked by a gesture of honor rare and beautiful—the city's tallest building lit up with an electric sign, "Welcome, Dr Pai," and the Mayor himself extended his warm welcome. It was a celebration of a bond built on shared dreams in the quiet pursuit of a greater good.

Another friendship that enriched Dr T M A Pai's journey was with Henry Niles and his wife, Mary Crushing Niles. Henry Niles, then the Deputy Director of the U S Technical Cooperation Mission in India, had first visited Manipal in 1953. Deeply moved by Dr Pai's work, the Niles' continued to nurture their bond with Manipal, offering hospitality to visiting staff and students from Manipal during their time in the United States. This connection endured for years, and in 1965, the Academy of General Education honored Henry and Mary Niles with honorary fellowships, a tribute to their kindness, respect, and unwavering support for Dr Pai's mission.

Dr Pai's impact also reached the United States Peace Corps, whose volunteers brought new warmth and dedication to Manipal. Five Peace Corps members—Paul Bachorz, Frances Colgan, Gladys Jimeno, Barbara Monroe, and Susan Friedman—came to Manipal as teachers and nurses in 1964. They embraced Dr Pai's dream, leaving their mark on the community and enriching the lives of students and patients alike. Frances Colgan's words reflect the admiration they felt: "May your Academy continue to grow into the finest institution of higher learning in India." It was a blessing and a promise, an enduring wish for the future of Manipal.

These friendships, these shared journeys, are at the heart of Dr T M A Pai's legacy. His vision for Manipal was always more than buildings or institutions; it was about building bridges—across borders, across cultures, across minds. Through friendships like those with Plissner, Niles, the Peace Corps volunteers, and many more, Dr Pai's Manipal became more than a place; it became a testament to the power of shared purpose... a legacy that continues to inspire.

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# Editor's Musings

Dear Reader,

Greetings...! The July-September quarter of 2024 has been quite vibrant for the MIT community, with numerous events being held, that reflected the academic rigor, commitment to excellence, and a sense of responsibility towards the society.

The academic year 2024-25 commenced with the orientation programs for the newly admitted undergraduate and postgraduate students, with a purpose to introduce them to the ethos of the mighty MIT. These programs provided the new entrants with a comprehensive overview of life at MIT, including academic expectations, co-curricular opportunities, and the support systems in place to foster their growth. Following the central orientation at the Institute level, individual departments hosted specialized sessions to familiarize the students with their respective branches of engineering.

On 16 September, MIT had the privilege of hosting the annual event, Prof. P V Bhandary Memorial Oration, a tribute to one of our most respected educators, along with the Engineers' Day celebrations for the year. The oration served as a reflection on the role of engineers in nation-building and the evolving landscape of technology.

Milan 2024, the annual Recruiter Meet held on 09 August 2024 in Bengaluru, brought together leading companies and recruiters. Organized by MIT's placement team, this event facilitated discussions on industry trends, talent requirements, and the ever-changing dynamics of engineering careers. Milan continues to strengthen the institute's relationship with its recruiters, paving the way for better opportunities for our students.

We are delighted to share the news about MAHE MIT NSS Units I & II being honored with the National Humanitarian Excellence Award 2024 by the I Care Foundation India. This recognition underscores the relentless efforts of our NSS volunteers who have been actively engaging with the community, promoting social welfare, and upholding the spirit of humanitarianism.

This year, MIT, Manipal had the privilege of hosting the 78th Independence Day at MAHE, Manipal. The grand event was a proud moment for the campus, as students, faculty, and staff came together to honor the nation's journey of freedom and progress, reaffirming our collective responsibility toward building a brighter future.

The Department of Instrumentation & Control Engineering successfully hosted the 21st Control Instrumentation Systems Conference (CISCON 2024) on 02 August 2024. CISCON remains a key platform for professionals, researchers, and students to exchange ideas on advancements in control and instrumentation systems, reinforcing MIT's commitment to fostering innovation in engineering.

Looking back at the calendar quarter gone by, as MIT continues to be a vibrant hub of academic excellence and strong community engagement, more and more exciting events are anticipated in the days to come.

Happy Reading...!

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### **BTECH ORIENTATION - MIT PRAVESH 2024**

The chief guest Ms Rakhee A Chachra, Global 5G Business Strategist, IBM, Gurgaon graced the first day event, Mr Sandeep Dutta, Senior Managing Director, India Business Lead, Accenture, Greater Delhi was the chief guest on 17 July 2024, Mr Madhav Nair, Country Head & CEO - India, Bank of Bahrain & Kuwait Mumbai graced the occasion on 18 July 2024, and Ms Veena Shenoy, Deputy General Manager - Strength, Stiffness and Durability CAE Simulations, Mercedes-Benz R&D, Bengaluru was the chief guest on the final day.

# MIT Pravesh 2024 - Day 1 16 July 2024

Day 01 of MIT Pravesh held on 16 July 2024 welcomed BTech students from Computer & Communication Engineering, Information Technology, Data Science & Engineering, and Computer Science & Financial Technology. The event featured Ms Rakhee A Chachra (1992-96 batch of Electronics & Communication Engineering), IBM's Global 5G Business Strategist, as the Chief Guest, and Lt Gen (Dr) M D Venkatesh, Vice Chancellor of MAHE, as the Guest of Honour. Dr Venkatesh highlighted the vast array of opportunities available at MIT Manipal and urged students to utilize them fully to enrich their academic journey.



Ms Chachra shared her career journey, encouraging students to embrace diverse paths to find their passions. Reflecting on her own journey from law to engineering, she highlighted the value of adaptability, resilience, and curiosity. Emphasizing the importance of time management, communication, and teamwork, Ms Chachra advised students to experiment, seize opportunities, and build meaningful connections on campus.

# MIT Pravesh 2024 - Day 2 17 July 2024

Day 2 of MIT Pravesh 2024, organized on 17 July 2024 for BTech students from Computer Science & Engineering, Computer Science & Engineering (AI &

ML), Mechatronics, and Mathematics & Computing. MIT Manipal introduced its Dual Degree program in Mechatronics with Deakin University, Australia—a first of its kind in the institute. Mr Sandeep Dutta (1989-93 batch of Electrical & Electronics Engineering), Senior Managing Director and India Business Lead at Accenture, was the Chief Guest, and Dr H S Ballal, Pro-Chancellor of MAHE, was the Guest of Honour.



Dr Ballal highlighted the significance of Manipal's core values and the wealth of opportunities available to students, urging them to make the most of their time on campus. Mr Dutta, speaking as both a seasoned professional and a parent, reassured parents about the safety and quality of education at MIT, praising the institute's legacy of over 60-years and a vast alumni network of over 70,000 professionals. He advised students to maintain a strong academic record and invest in personal growth. Highlighting the value of versatility and teamwork, Mr Dutta encouraged students to actively network, participate in campus life, and leverage resources like Coursera access and carefully chosen internships to enhance their employability.

# MIT Pravesh 2024 - Day 3 18 July 2024

Day 3 of MIT Pravesh 2024 was organized for BTech students from Electrical & Electronics Engineering, Electronics & Communication Engineering, Electronics Engineering (VLSI Design and Technology), Electronics and Instrumentation Engineering, and Cyber Physical Systems on 18 July 2024.

Mr Madhav Nair (1989-93 batch of Electrical & Electronics Engineering), Country Head & CEO of Bank of Bahrain & Kuwait, Mumbai, was the Chief Guest, and Dr K Ramnarayan, Pro-Chancellor of Sikkim Manipal University, was the Guest of Honour. Dr Ramnarayan highlighted the transformative educational opportunities at MIT and encouraged students to make the most of these resources to shape their careers. Mr Nair spoke on the profound historical impact of engineering, tracing its

evolution from the first industrial revolution to today's data-driven fourth industrial revolution, where human-machine collaboration and technology are transforming society.



Mr Nair introduced the concept of "black swan" events and advised students to cultivate resilience and adaptability to excel in a technologically advanced world. Mr Nair encouraged students to act with integrity, consider the societal impact of their choices, and make meaningful contributions, expressing confidence in their potential to become influential leaders and innovators of the future.

# MIT Pravesh 2024 - Day 4 19 July 2024

Day 4 of MIT Pravesh 2024 was organized for BTech students from Aeronautical, Automobile, Biomedical, Biotechnology, Chemical, Civil, Mechanical, Mechanical (Dual Degree with Deakin University), and Industrial Engineering. Ms Veena Shenoy (1993-97 batch of Civil Engineering), Deputy General Manager of Strength, Stiffness, and Durability CAE Simulations at Mercedes-Benz R&D, Bengaluru, was the Chief Guest, and Dr P Giridhar Kini, Registrar, MAHE was the Guest of Honour.



Dr Giridhar Kini highlighted the importance of resilience and adaptability in today's rapidly evolving engineering landscape. Ms Veena Shenoy shared her experience of being an engineer, beginning with her own campus interview experiences and culminating in her work on aircraft

engines at General Electric and later in the automotive industry. Ms Shenoy also highlighted the interdisciplinary nature of engineering, illustrating how various fields come together in the development of complex products like aircraft engines and automobiles.

# MIT Pravesh 2024 Student Induction Program 2024

The formal Orientation program was followed by the department-level Orientation Programs (17 to 20 July 2024) where each department held department-level familiarization program for the students.

An institute-level two-week Student Induction program was held during the week following the formal Orientation Program from 22 July to 03 August 2024. A carefully designed program that included sessions on academic activities, familiarization of MIT facilities, E-pad training, interaction with the Teacher Guardian, Student Welfare activities, student-related regulations at MIT, Major Student Projects, Placement and International relationships and Research & Innovation.



Talks by eminent speakers and interactive sessions were arranged for the benefit of budding engineers.

The following are the details of the sessions:

- "Standardization in Engineering" by Bureau of Indian Standards on 29 July 2024
- "Importance of Yoga for Youth" by Dr Patil N J, Associate Professor - Centre for Integrative Medicine & Research (CIMR) - Yoga MAHE, Manipal on 30 July 2024
- "Engineering a Healthy Mind: Addressing Psychological Issues in Students" by Dr P V Bhandary on 31 July 2024
- "Creation of IPs" by Dr Varadarajan, MAHE, Manipal on 01 August 2024
- "Pause, Breathe and Choose" by Dr Shwetha and Ms Indu Toby of MCHP, MAHE, Manipal on 02 August 2024
- "Phronesis, Logical Reasoning, Critical Thinking, Brain-Computer Interface (BCI) and Research Mindset in the age of AI" by Mr A H Sagar, International Educationalist, Philosopher & Speaker on 03 August 2024

In addition to these special talks, interactive session on Universal Human Values & emotional Intelligence, awareness on Prevention of Sexual Harassment at workplace, and sessions on Creativity, Problem Solving & Innovation were delivered as part of student induction program.

# Session on Challenges & Opportunities in Cybersecurity

As part of the orientation program for the new batch of BTech students, an insightful guest talk titled "Challenges and Opportunities in Cybersecurity" was organized by the Office of The Associate Director (Faculty Development & Welfare) on 27 July 2024. Mr Rajshekhar P, the Founder Director of ISAC delivered the talk for the benefit of the budding engineers.

Mr Rajshekhar P discussed the various challenges and opportunities in the rapidly evolving field of cybersecurity. His talk provided students with a comprehensive understanding of the current landscape of cybersecurity, including the threats and vulnerabilities that organizations face and the potential career opportunities in this field. His talk emphasized how the rapid advancement of technology has led to a corresponding rise in cyber threats, making cybersecurity a critical concern for individuals, businesses, and governments alike. He elaborated on different types of cyber threats, such as malware, phishing attacks, ransomware, and advanced persistent threats (APTs), and highlighted with real-world examples.



Mr Rajshekhar P also addressed the various opportunities available in the cybersecurity sector. He discussed the growing demand for cybersecurity professionals and the wide range of career paths within the field, including roles such as security analysts, ethical hackers, cybersecurity consultants, and chief information security officers (CISOs). Additionally, Mr Rajshekhar provided practical tips on how students can enhance their cybersecurity skills. He recommended various online courses, certifications, and resources that students can use to deepen their knowledge and expertise in cybersecurity. He also spoke about the importance of developing a strong ethical foundation and the role of ethical hacking in identifying and mitigating security vulnerabilities.

# Session on Building Inner Confidence

As part of the orientation program for the new batch of BTech students, an insightful guest talk titled "Building Inner Confidence" was organized by the Office of The Associate Director (Faculty Development & Welfare) on 27 July 2024 for newly joined BTech students.

Mr Shivam, an author of two books and life coach on emotional intelligence and an alumnus of MIT was the resource person. Mr Shivam, in his talk communicated practical strategies that students can employ in their daily lives to improve their self-assurance and emotional resilience. By focusing on inner confidence, Mr Shivam aimed to empower students to navigate their personal and professional lives more effectively, fostering a sense of self-reliance and positivity. He provided the students with tools and techniques to boost their self-confidence.



Mr Shivam's background as an MIT alumnus added a personal touch, as he understands the unique challenges faced by the students and the opportunities available to them. His journey from MIT student to a successful author and life coach served as an inspiring example of what can be achieved through dedication and self-confidence.

In addition, Mr Shivam, also held two additional sessions on "Building Inner Confidence" for the post graduate students - one session for MCA students and another session for MSc students on 26 July 2024.

# Session on Standardization Ecosystem

As part of the orientation program for the new batch of BTech students, a guest talk titled "Standardization Ecosystem" was organized by the Office of The Associate Director (Faculty Development & Welfare) on 29 July 2024

Smt Deepti Arora, Scientist D & Joint Director, Officer incharge, Chemical Laboratory, BNBL, Bureau of Indian Standards (BIS), Bangalore was the resource person for the event. Smt Arora delivered an insightful presentation on the "Standardization Ecosystem," providing valuable information on the objectives, roles, and functions of the Bureau of Indian Standards (BIS). Her talk covered the history, structure, and significance of BIS in ensuring quality and safety standards in various sectors. She highlighted the principles of standardization, the importance of consensus, and the role of various stakeholders in the process. Smt Arora also discussed the challenges and successes in maintaining high standards across different industries and how BIS contributes to this effort. Through specific case studies, Smt Arora illustrated the crucial role of standardization in improving product quality and safety, emphasizing the impact of BIS standards on consumer protection and industrial growth. The event was also part of the MoU with BIS to introduce the concept of standardization into the curriculum and thereby make the students aware of the Indian standards and the activities of BIS.



# MIT Pravesh 2024 Postgraduate Orientation Program

Manipal Institute of Technology, Manipal, held an orientation program for the newly admitted master students on 29 July 2024. The orientation program aimed at preparing them for academic and professional environments. Dr Somashekara Bhat, Joint Director, MIT, delivered the opening address. Cdr (Dr) Anil Rana, Director, MIT highlighted resources and supportive learning environment available at MIT, Manipal.



Dr Geetha Maiya, Director, Student Affairs, MAHE, outlined the comprehensive support services available, including counselling, extracurriculars, and health services to ensure students have a well-rounded experience. Dr Raviprakash, Associate Director (Academics), detailed the academic structure and expectations, and Dr Ashok Rao, Associate Director (Research) encouraged students to take advantage of research and consultancy opportunities offered at MIT.

The orientation for the MTech students was held in the forenoon. Dr Raviraja N S, Chief Operating Officer of MAHE, was the chief guest for the event. He reflected on the institute's storied legacy, beginning with its founder, Dr T M A Pai. Emphasizing the importance of holistic education, Dr Raviraja introduced the concept of "Ikigai," encouraging students to align their passions with their career paths.



The orientation for MCA and MSc students was held in the afternoon. Dr Karunakar A Kotegar, Director of International Relations, MAHE was the Chief Guest. Dr Kotegar addressed the transformative impact of artificial intelligence and the value of adaptability in today's world. He shared the ten success principles such as work ethic, passion, and the importance of being open to newer ways of learning.

# Immersion Program BTech International Students

MIT Manipal organised an orientation program for international students enrolled to the BTech program on 08 July 2024. It aimed to introduce them to the academic and co-curricular opportunities available for them at the institute. Cdr (Dr) Anil Rana, Director MIT, spoke to students about the institution's multidisciplinary environment that supports collaboration across fields such as technology, humanities, and social sciences. He assured students of the diverse exposure next four years would hold for their personal and academic growth.



In his presentation, Dr Raviprakash Y, Associate Director (Academics), outlined the academic regulations followed at MIT Manipal. He emphasized the array of resources MIT provides, such as library and lab facilities, computer centres, and research hubs, to support a culture of learning and innovation in addition to subscription to Coursera and other platforms.

Dr Poornima P Kundapur, Associate Director (Student Welfare), stressed the importance of cultivating a positive attitude and strong interpersonal skills for success. She introduced students to the comprehensive support system extended by the office of Student Welfare, which spans healthcare, counselling, and grievance redressal. Dr Kanthi M, Associate Director (Alumni, Public Relations & International Relations), highlighted career pathways and MIT's strong focus on innovation and internationalization for the benefit of students.



### MIT Pravesh 2024 Orientation for BTech Lateral Students

The orientation program for the BTech Lateral Students was organized on 05 July 2024. The event aimed at providing an overview of the university's history, vision, and mission to students along with familiarizing them to the institute.

During the event, Cdr (Dr) Anil Rana, Director, MIT, in his address emphasized the value of hard work, dedication, and the opportunities at MIT Manipal for engineering students. Dr Raviprakash Y, Associate Director (Academics) provided an overview of the academic processes at MIT. Dr Shankaranarayana Bhat, Associate Director (Faculty Development & Welfare), introduced the Impartus Lecture Capture Solution. He explained how this technology would enhance their learning experience by providing access to recorded lectures, enabling students to learn asynchronously beyond the classroom.

Dr Poornima Panduranga Kundapur, Associate Director (Student Welfare), gave an overview of campus life at MIT. She highlighted the various extracurricular

activities, clubs, and support services available to students, encouraging them to participate and make the most of their campus experience. Col Vinod Bhasker, Chief Warden, briefed the students about the hostel regulations. He emphasized the importance of discipline, safety, and mutual respect within the hostel premises. Dr Somashekara Bhat, Joint Director, MIT, delivered the concluding remarks reiterating the importance of making the most of the learning environment in their academic journey at MIT.



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### **ENGINEER'S DAY & PROF P V BHANDARY ORATION**

Therapy at Boston Scientific Neuromodulation, USA and Adjunct Professor at the Prestigious Mayo Clinic, Jacksonville, USA. Dr Subramanian's talk, titled "Neural Circuits & Advanced Therapeutics", offered valuable insights into the latest advancements in neuroscience and medical technology, including discussions on DBS, neuromodulation, neural circuits, and bioengineering designer drugs.



In his presidential address, Cdr (Dr) Anil Rana, Director of MIT Manipal, highlighted the significance of Engineer's Day and the vital role played by engineers. He also recalled the contributions of Prof P V Bhandary, whose legacy continues to inspire faculty members and future generations of engineers at MIT, Manipal.

A special tribute to Prof P V Bhandary was offered by Dr Raghuvir Pai B, Professor of Mechanical and Industrial Engineering. He narrated with anecdotes

the contributions of Prof P V Bhandary to engineering education in general and his leadership at MIT Manipal. The event commenced with a floral tribute to Sir M Visvesvaraya and Prof P V Bhandary, followed by an invocation by Mrs Chaitra M, Assistant Professor (Senior Scale) from the Department of Civil Engineering.



Dr Somashekara Bhat, Joint Director of MIT Manipal, delivered the welcome address, setting the stage for the day's proceedings, while Dr Shankaranarayana Bhat, Associate Director (Faculty Development & Welfare), delivered the vote of thanks. Mrs Soumya S, Assistant Professor (Senior Scale), Department of Electronics & Communication Engineering anchored the event. The ceremony was attended by faculty members, research scholars, students, and invited guests. Among the dignitaries were Brig (Dr) Surjit Singh Pabla, Former Director of MIT Manipal and Pro-Vice Chancellor of MAHE, former faculty members, IE members, Associate Directors, Heads of Departments (HODs), Prof P V Bhandary's family and admirers, and other invited guests.

# **EVENTS AT MIT**

# MILAN 2024: Recruiter Meet in Bengaluru

The Milan 2024 - Recruiter Meet, held at the Courtyard Marriott, Bengaluru, on 09 August 2024, marked a significant milestone in enhancing the synergy between industry and academia. The event witnessed the participation of 84 prominent companies who are regular recruiters of MIT students, and over 200 distinguished delegates, leading to professional collaboration.

During the inaugural session the Pro-Vice Chancellor (Technology and Science) of MAHE, Dr Narayana Sabhahit as the chief guest, highlighted the importance of industry academia partnerships and its pivotal role in advancing education and driving innovation.

The Pro-Vice Chancellor (Management, Law, Humanities, and Social Sciences) of MAHE, Dr Madhu Veeraraghavan provided a comprehensive overview of MAHE's diverse educational ventures and its commitment to academic excellence. Further, the Director of MIT Manipal, Cdr (Dr) Anil Rana, emphasized the institution's proactive engagement with various sectors, which fosters an environment conducive for promoting innovation

and excellence. The Director of MIT Bengaluru, Dr Iven Jose, reiterated the institution's ongoing efforts to collaborate with various industries to enhance educational outcomes.

The Associate Director (Industrial Liaison, Placement & Practice School), Dr K V Sriram, appealed to industry representatives for strengthening the collaborations that would offer students a broad spectrum of career opportunities. The Director of Corporate Relations, Dr Harish Kumar, elaborated on the significant contributions of MAHE in bridging the gap between academia and the corporate world, facilitating meaningful engagement with industry. Dr Somashekara Bhat, Joint Director, MIT Manipal delivered the vote of thanks.

The event featured dynamic interactive sessions, which provided a platform for delegates from industry to engage directly with the students. These sessions were instrumental in fostering a two-way exchange of ideas, insights, and potential opportunities, enriching the overall experience for the key stakeholders.







# MIT, Manipal hosts 78th Independence Day Celebration at MAHE

Manipal Institute of Technology (MIT), Manipal, hosted the 78th Independence Day celebration on 15 August 2024. The event was held in front of the Department of Basic Medical Sciences, Manipal.

Dr H S Ballal, Pro Chancellor, MAHE Manipal, was the chief guest, and Lt Gen (Dr) M D Venkatesh, VSM (Retd), Vice Chancellor, MAHE Manipal, was the guest of honour. Dr P Giridhar Kini, Registrar, MAHE, Manipal, Dr Somashekar Bhat, Joint Director, MIT, Manipal, and other Head of the various institutions of MAHE, Manipal, faculty, staff and students participated in the celebrations.



The day commenced with a guard of honour received by the Chief Guest, Dr H S Ballal, Pro Chancellor, MAHE Manipal in front of the Department of Basic Medical Sciences. Dr Somashekar Bhat, Joint Director, MIT, Manipal welcomed the gathering.



The National flag was hoisted by the chief guest, Dr H S Ballal, Pro Chancellor, MAHE Manipal. This was followed by Parade Reporting, Inspection, and

March Past. The Guest of Honor, Lt Gen (Dr) M D Venkatesh, VSM (Retd), Vice Chancellor, MAHE delivered the Independence Day message.



Further, Manipal Institute of Technology, Manipal winning the First Place as the Contingent Prize Winners made the event special for the hosting Institute. Kasturba Medical College (KMC), Manipal won the Second Place while Manipal College of Health Professions (MCHP), Manipal won the third place in the event.



Dr Sriram K V, Associate Director, Industry Liaison, Placement & Practice School, MIT Manipal, delivered the vote of thanks. Mr Suhas Kowshik, Assistant Professor -Senior Scale, Department of Mechanical & Industrial Engineering, MIT Manipal, and Dr Shilpa Suresh, Assistant Professor, Mechatronics Engineering Department, MIT Manipal, were the masters of ceremony.



# NAIP-2024: A Week of Immersive Learning and Exploration

Manipal Institute of Technology (MIT), Manipal hosted The National Academic Immersion Program (NAIP-2024) from 08 July to 14 July 2024 on Robotics, Cybersecurity, and Mechanical Engineering Science. The program aimed to bridge the gap between academic theory and real-world applications in these critical fields. A total of 88 students and five faculty members from Dr Vishwanath Karad MIT World Peace University (WPU) participated in the week-long program, which combined technical sessions, hands-on training, industrial visits, and cultural excursions.



In the inaugural ceremony held on 08 July 2024, the chief guest, Cdr (Dr) Anil Rana, Director of MIT, highlighted the importance of Robotics and in Cybersecurity the current technological landscape. Program Chairman Dr Dattaguru V Kamath, Professor and Head of Mechatronics, delivered a warm welcome, setting the tone for the program. Dr Arunachala U Chandavar, Professor and Head of Mechanical and Industrial Engineering, provided an insightful briefing on the planned industrial visits, emphasizing the hands-on learning opportunities they would offer. Over the first five days, participants attended technical sessions led by experts from the Department of Mechatronics and the Department of Mechanical and Industrial Automation. These sessions blended theoretical knowledge with practical applications, offering students valuable insights into cutting-edge technologies. On 13 July 2024, the group visited the



Varahi Underground Powerhouse in Hosangadi, gaining firsthand exposure to industrial operations.

The next day, participants explored cultural and academic landmarks, including the Hasta Shilpa Heritage Village Museum, Krishna Mutt, and MAHE's facilities such as the Manipal Museum of Anatomy and Pathology, Experience Theatre, and key laboratories.

The valedictory ceremony was held on 14 July 2024 to mark the culmination of the workshop. Dr Ramachandra Murthy V, Associate Director (Development), MIT, Manipal, the chief guest for the event and Dr Dattaguru V Kamath, the Program Chairman for the event deliberated on the positive impact of the program. Awards for the best participants were announced by Dr Arunachala U Chandavar, and program coordinator Dr Ankur Jaiswal delivered the vote of thanks.



# Talk on Journey from BTech@MIT to MSc@TUM Germany

The Department of Mechanical and Industrial Engineering hosted an engaging interactive discussion session with Mr Rajat A Chandavar, a current MSc student in Computational Science and Engineering at the Technical University of Munich (TUM), Germany on 05 September 2024. The event, titled "My Journey: BTech (Mechanical) to MSc (Computational Science and Engineering) - TUM Germany," offered a unique opportunity for students aspiring to pursue higher education abroad, particularly in Germany, to gain valuable insights. During the session, Mr Chandavar detailed his academic journey, highlighting the importance



of projects and internships during undergraduate studies. He encouraged students to actively participate in research and industrial training to enhance their profiles for admission to top international institutions.

# MAHE MIT NSS Units I & II receives National Humanitarian Excellence Award 2024

The National Service Scheme (NSS) Units I & II of Manipal Institute of Technology (MIT), a constituent unit of MAHE, have been awarded the prestigious National Humanitarian Excellence Award 2024.

This recognition comes as a celebration of their outstanding dedication to social welfare and humanitarian causes. The award, conferred by the I Care Foundation India (R), under the aegis of NITI Aayog & MSME, Government of India, acknowledges the exceptional contributions by NSS units in the field of social work and community engagement.

The award was presented during a special ceremony on 15 August 2024, in New Delhi coinciding with India's 78<sup>th</sup> Independence Day and World Humanitarian Day. Cdr (Dr) Anil Rana, Director, MIT Manipal, Dr Balakrishna S Maddodi, MIT NSS Program Officer, and Sri Ratnakar Samanth, MIT Administrative Officer received the award from Sri Santosh Bagrodia, former Minister for Coal and Member of Parliament, Rajya Sabha.

The humanitarian work carried out by the MAHE MIT NSS units over the past year has significantly contributed to the betterment of society. Their activities, which involved over 45 community



programs during the 2023-24 academic year, focused on key areas such as health awareness, environmental conservation, and social responsibility.

Highlighted programs conducted include blood donation camps, environmental awareness drives such as beach clean-ups and plastic eradication campaigns, rainwater harvesting projects, and plantation initiatives. The conferring of prestigious award serves as both recognition and motivation for the MIT NSS teams to continue their selfless service and drive toward social responsibility.

# Workshop on Al Trends, Tools, and Methodologies

A one-day workshop titled "Trends, Tools, and Methodologies in Al" was organized by the Department of Electronics and Communication Engineering in collaboration with IET India on 27 July 2024. Mr Vimal Chaubey, a Data Engineer from Tata Croma, was the resource person for the workshop and the workshop focused on emerging trends in Artificial Intelligence, cutting-edge tools, and methodologies shaping the future of AI.

Mr Vivek Ramakrishna, General Manager of IET India, opened the session by introducing IET and its role in facilitating industry-academia collaboration. Mr Chaubey, the resource person, later delivered a comprehensive overview of AI trends, including tools like ChatGPT, Gemini, and GitHub Copilot. He also led hands-on sessions that demonstrated the



practical application of these AI tools in regular work environments, alongside a Python implementation of large language models using Google Collab. The event was coordinated by Dr Kanthi Hegde, Dr Asha C S, Dr Vishnu Unnikrishnan, and Dr Divyashree, faculty members of MIT Manipal.



# Guest Talk on Geospatial AI for Monitoring Food Security and Climate-Resilient Agriculture

The Industry Advisory Committee (Electrical Stream) of MIT Manipal organized an insightful guest talk on "Geospatial AI for Monitoring Food Security and Climate-Resilient Agriculture" on 10 August 2024. Dr Kumar Rajamani, Associate Director at Cropin, a leading agri-tech company, an expert in AI and remote sensing, shared his knowledge on the transformative role of Geospatial AI in agriculture and its potential to address pressing challenges in food security and climate resilience.

During the session, Dr Rajamani discussed several key themes, including recent advancements in Al and Deep Learning, particularly in the context of agricultural monitoring. He highlighted how Alpowered Land-Use and Land-Cover (LULC) mapping and cloud cover removal using satellite imagery, such as Sentinel-1 and Sentinel-2, can significantly



enhance the precision of remote sensing in agriculture. He also shed light on the challenges faced in remote sensing, such as data limitations and computational constraints, while presenting innovative Al-based solutions that are currently being researched and developed to overcome these hurdles.

# School Connect Program by NSS Units of MIT

National Service Scheme (NSS) Units, MIT Manipal organized a talk by Dr Prof B V Rajendra, Professor, Department of Physics, MIT Manipal as a part of its school connect program on 21 August 2024 at Government Composite High School Rajeev Nagar - Manchikere, Manipal.

Dr Rajendra spoke on Synthesis of Nano materials and their applications. He gave examples from nature to explain some nanomaterials and their applications, challenges, and opportunities in the domain. Mr Balakrishna, Headmaster of the High School welcomed the gathering. Mr Prakash Prabhu, the science teacher from the school introduced the speaker, while Mr Aravinda Prabhu, a teacher from



the school, delivered the vote of thanks. The students and teachers at the school participated in the interactive session.

# **Entrepreneurial Journey Program for MIT Faculty**

The Mechanical and Industrial Engineering Department of MIT Manipal hosted a day-long workshop titled "Entrepreneurial Journey Program" on 16 July 2024. This event, a part of the IIC Level 2 activities, was designed to enhance the faculty's role in driving commercialization within higher education.

The program was led by Dr Raghavendra Holla, Associate Professor, Department of Civil Engineering and Dr Shrihari Upadhyaya, Additional Professor, Department of Mechanical and Industrial Engineering, who shared their knowledge and experiences with the faculty participants. The sessions covered crucial topics such as the MAHE Startup Ecosystem, entrepreneurial mindset, and commercialization aspects in academic courses.



Dr Holla provided valuable insights into mentoring student startups and the associated challenges, while Dr Upadhyaya offered an in-depth look at the importance of team building and entrepreneurial thinking through various real-world examples.

# Seminar on Harnessing Digital Twins for Mechatronics Applications

A seminar on "Harnessing Digital Twins for Mechatronics Applications" was organized by the Department of Mechatronics in collaboration with IEEE Circuits and Systems Society (CAS) on 24 July 2024.

Mr Chandrasekhar Arcot, Vice President of Engineering at Altair, Bangalore, as a guest speaker, delivered an insightful lecture on the potential of digital twin technology and its applications in various industries, including automotive, consumer products, and healthcare.

The seminar focused on the advantages of digital twin technology, such as predictive maintenance, reduced downtime, and accelerated innovation. Participants were introduced to Altair HyperWorks, Altair HPC Works, and Altair RapidMiner, alongside other key industry trends like simulation and IoT.



The session also covered intricate technical aspects like battery system data design, systems modeling, and Al models.

Dr Dattaguru V Kamath, Head of the Department of Mechatronics, expressed his gratitude to the speaker and encouraged the participants to enhance their knowledge in the field.

# MAHE MIT NSS Unit Organizes Nature Walk to Promote Environmental Awareness

MAHE-MIT NSS Units organized a Nature Walk to promote environmental awareness on 04 August 2024. The five kilometer walk around MIT-Manipal and Manipal Lake allowed National Service Scheme (NSS) volunteers to learn about the history, biodiversity, and life systems surrounding the lake. Guided by noted environmentalist Wing Commander Bhojraj from Rotary Club Manipal Lake, the volunteers gained insights into the importance of conservation and the need to protect natural resources.

During the walk, the volunteers planted 49 saplings around the lake. Rtn Supretha Shetty, President of Rotary Club Manipal Hills, addressed the volunteers, encouraging them to develop a connection with nature and to be part of solutions for the environmental challenges.



The Nature Walk was organized by Dr Balakrishna Maddodi, Associate Professor, Department of Civil Engineering and NSS Program Officer. It was supported by Dr Lakshman Rao, Associate Professor, Department of Electrical and Electronics Engineering and Dr Poornima Bhagavath, Associate Professor, Department of Chemistry.

# MIT Celebrates Kargil Vijay Diwas

Eco-activist and naturalist Professor S A Krishnaiah donated 25 rare Talipot Palm saplings (Corypha umbraculifera) to the Manipal Institute of Technology on 26 July 2024, to mark the 25<sup>th</sup> Anniversary of Kargil Vijay Diwas. Highlighting the endangered status of these botanical specimens, Prof Krishnaiah called for intervention at academic and national levels to preserve them. He urged the community to adopt the motto 'Hasuru Honnu Bithona Jagadagala' ('Let us plant green seeds and plants of emerald value globally') to contribute to environmental conservation.

This initiative is part of the larger 'Green India Vision' campaign, also known as 'Oppiko Pacche



Vanasiri Abhiyan,' which aims to build a greener and more sustainable India through sapling plantations and nurturing. Launched in 2018, the campaign has gained momentum globally, promoting environmental protection and the conservation of endangered plants and trees.

# Launching of Windows Co-Pilot Lab at MIT, Manipal

The Windows 11 Co-Pilot Lab, an initiative by Microsoft in collaboration with MIT Manipal, was inaugurated by Cdr (Dr) Anil Rana, Director of MIT, alongside Microsoft's City Head on 19 August 2024. The event began with an engaging talk and workshop by Mr Ansh Mehra, an AI expert and influencer. Mr Mehra's session set the tone by showcasing the latest trends and practical uses of AI tools.

The Co-Pilot Lab was operational for a period of one month from 16 August 2024. It was equipped with Windows 11 laptops, a dedicated Co-Pilot Expert, an Xbox Game Pass Zone, and a coffee area, providing a dynamic space for creativity and innovation. Weekly challenges, designed by the Windows 11 Campus Play Co-Pilot Team, encouraged students to tackle tasks of varying complexity.

More than 800 students visited the lab, and over 100 actively participated in the challenges. Bhattiprolu Vijay Adithya, a first-semester BTech (E&C Engineering) student, emerged as the winner of the



month-long competition, earning a Surface laptop worth INR 1.5 lakh.

As the curtains closed on 16 September 2024 after a month-long activity, the success of the Co-Pilot Lab signalled a bright future for similar collaborations, paving the way for students to harness the potential of technology in a rapidly evolving world. It demonstrated MIT Manipal's dedication to integrating cutting-edge technology into education, offering students hands-on exposure to Al-driven tools.



Mr Ansh Mehra at Inauguration of Windows Co-pilot Lab



MITians at the Windows 11 Co-pilot Lab at NLH



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# CISCON 2024 emphasizes Research and Innovation

The 21st Control Instrumentation Systems Conference (CISCON 2024) was held at MIT Manipal, on 02 August 2024 by the Department of Instrumentation & Control Engineering.

Dr Shashikant Sadistap, Chief Scientist at NEERI, CSIR Nagpur, delivered the inaugural address, encouraging students to remain positive and focused on their goals. Lt Gen (Dr) M D Venkatesh, Vice Chancellor, MAHE, emphasized the importance of research leading to innovation. He highlighted MAHE's commitment to interdisciplinary research, especially in healthcare products.



Cdr (Dr) Anil Rana, Director, MIT Manipal, stressed the relevance of Artificial Intelligence and Machine Learning in solving complex engineering problems and urged the participants to gain a deeper understanding of these technologies. Dr Vishal Sharma, Research Engineer at INTEL Bengaluru,



advised researchers to align their work with market or societal needs for greater impact.

The conference commenced with a welcome address by Prof Shreesha C, Head of the Instrumentation & Control Engineering Department, followed by an overview by the convener, Dr Vikash Singh, Associate Professor, in the inaugural session. Dr Rituraj Bhattacharjee, Co-Convener of CISCON 2024, delivered the vote of thanks.

The event, funded by SERB (Government of India), ARK Infosystems Chennai, and Canara Bank, witnessed the submission of over 800 manuscripts, with around 90 selected for presentation.

# Blood Donation Camp and Rainwater Harvesting Initiative by NSS Units

MAHE-MIT NSS Units, in collaboration with Abhayahastha Charitable Trust and KMC Manipal, organized a successful Voluntary Blood Donation Camp at the KMC KH Blood Centre on 25 June 2024. NSS volunteers and students from MIT donated blood, addressing a critical shortage at the center and saving lives through their contributions.

In addition to the blood donation drive, the NSS units launched a rainwater harvesting project as part of their annual camp. Four pits were constructed on the MIT campus to capture monsoon runoff and recharge the groundwater. This initiative contributes to environmental

sustainability and promotes long-term water conservation efforts within the campus.



# Training session on the Al Arm BOT, Drone and Smart City Module

Dr Moorthi Kanagaraj, Founder and Director of Enthu Technology Solutions India Pvt Ltd, Coimbatore, visited the Instrumentation and Control Engineering, MIT, Manipal during 25 and 26 September 2024, to conduct a training session on the AI Arm BOT, Drone, and Smart City module.

During his visit, he also interacted with MTech students, providing valuable insights into internship opportunities at Enthu Technology Solutions.



# International Symposium on Current Trends in Biomedical Engineering (ISCTBME 2024)

The Department of Biomedical Engineering, MIT, Manipal, hosted an International Symposium on Current Trends in Biomedical Engineering (ISCTBME 2024) on 10 August 2024 in hybrid mode.

The event, organized to celebrate the department's Silver Jubilee, brought together academics, industry leaders, and researchers to discuss latest developments in biomedical engineering.



Dr Suparna Mukherji from IIT Bombay, was the chief guest for inaugural event while Dr P Giridhar Kini, Registrar, MAHE was the Guest of Honor. Dr Ashok Rao, Associate Director (Research & Consultancy), MIT and Heads of the departments graced the occasion. Dr Niranjana S, Professor and Head of the

Department, provided an overview of the program and set the tone for the symposium.

The event featured keynote addresses by experts such as Dr Suparna Mukherji, Dr Ashish Singal, Dr Venkatesh Mani, Dr Harikrishna Rai, and Dr Hari Subramanian, covering topics like antimicrobial resistance, medical device advancements, Aldriven MR scan automation, and bioengineering therapies for neurodegenerative disorders.

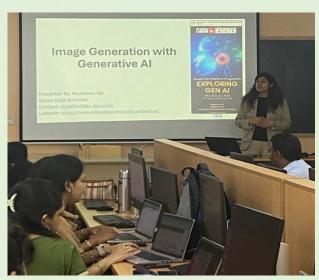
The poster session at the event showcased 40 innovative research projects. Awards were presented for exceptional research contributions during the valedictory session. Dr Jeevan M. Associate Professor, and Dr Amritanshu Gupta, Assistant Professor, were the convenors of ISCTBME 2024.



# Faculty Development Program on Generative Al

The Department of Information & Communication Technology, MIT, Manipal, in collaboration with IBM, conducted a three-day Faculty Development Program (FDP) on "Exploring Generative AI" during 10-12 July 2024.

Anjana Hariharan, Executive Partner at IBM Consulting, was the chief guest for inaugural session and it was presided over by Cdr (Dr) Anil Rana, Director, MIT.





Expert speakers from IBM, including Mr Tanveer, Mr Sarthak Mishra, Ms Isha Aneja, Mr Vinay Kalmoodkar, Ms Khushboo Tak, Mr Yogesh Narasimha, and Mr Sachin Mudholkar, delivered sessions on key aspects of generative Al. Topics covered included large language models, finetuning techniques, prompt engineering, few-shot learning, retrieval-augmented generation (RAG), and more.

Dr Siva Kumar, Associate Professor, was the Convener, while Dr Kaliraj, Associate Professor, and Dr Adesh, Associate Professor were the Co-Convenors of the event. This collaborative effort between academia and industry provided participants with valuable insights into leveraging generative Al in research and teaching.

# Five Day Hands-on Training on Immersive Technology

The Department of Instrumentation and Control Engineering, in collaboration with ARK Infosolutions, organized a five-day hands-on training program on "Immersive Technology." The training was held from 08 to 12 July 2024 at the CPS Immersive Technology Lab.

Mr Rameshkumar K., an Industry expert from ARK Infosolutions conducted the sessions for students. Dr Bhagya R. Navada, Assistant Professor - Senior Scale, Department of Instrumentation & Control Engineering, coordinated the program and Dr Shreesha C, Professor and Head of the Department guided the event.



# Three Day Industrial Workshop on Next Generation Industrial Automation Using Event-Driven Programming

The Schneider Electric Centre for Industrial Research in Intelligent Technologies at Manipal Institute of Technology (MIT), hosted a three-day industrial workshop during 29 - 31 July 2024. The workshop focused on "Next Generation Industrial Automation Using Event-Driven Programming." The workshop brought together experts from Schneider Electric and MIT Manipal to offer insights and handson experience in the latest advancements in industrial automation. Dr Manohara M Pai, Senior Department of Information Professor, and Communication Technology, along with the Schneider Electric team, highlighted the significance of their collaboration.

The second day focused on the technical aspects of event-driven programming, with an emphasis on the IEC 61499 standard. Nikhil Gadre from Schneider Electric introduced the standard, followed by a session by Vishnu M P on EcoStruxure Automation Expert (EAE), where participants were given an exposure to the basic use cases and components. The day concluded with practical exercises led by Mr Anuj Mahajan and Mr Sahil



Sharan from the Department of Instrumentation and Control Engineering (ICE), offering attendees the opportunity to apply their learning in real-world industrial automation scenarios.

The final day featured advanced topics, including a session on event-driven programming by Mr Hrishikesh Shankar Gawade and Mr Rishi Bajaj from the Mechatronics Department. Dr Nikhil Pachauri, Assistant Professor, Department of Mechatronics presented data-driven soft sensors emphasizing their role in optimizing industrial automation systems.

# Yoga Session at the Department of Physics

Department of Physics hosted a yoga session titled "Yoga: Relaxation and Focus" on 28 September 2024. Dr Lavya Shetty, faculty, Division of Yoga-CIMR, MAHE delivered an engaging and practical session, focusing on techniques to improve attention and physical relaxation. She highlighted the significance of regular yoga practice for achieving inner peace and better concentration. The session also involved an interactive session where Dr Shetty addressed attendees' questions, discussing the long-term benefits of yoga for personal and professional development. Dr Sudha



D Kamath, Professor and Head of the Physics Department, opened the session and welcomed the gathering. A total of 34 attendees, including faculty members, research scholars, and postgraduate students, participated in the event.

# Two Day Workshop on Analog and Digital design using Cadence EDA Tools

The Department of Electronics and Communication Engineering (E&C) organised a Two-Day workshop on Analog and Digital Design Using Cadence EDA Tools during 12 and 13 August 2024.



The workshop was facilitated by Mr. Navaneeth Krishna, a certified expert from Entuples Technologies, Bangalore. The workshop was designed to bridge the gap between theoretical concepts and industry-standard practices, utilizing



Cadence EDA tools for all demonstrations and exercises.

The sessions provided participants with hands-on experience in ASIC flow- designing and verifying both analog and digital circuits till GDS-II file generation. MTech & BTech students, and faculty members from the department attended the workshop.

# One Day Workshop on Introduction to Systems Medicine

The Department of Electronics and Communication Engineering organized a One-day workshop on Introduction to Systems Medicine on 22 August 2024. The workshop, led by Mr Suryadipto Sarkar, Alumnus of the ECE Department, provided an indepth exploration of the intersection between deep learning, machine learning, and systems medicine.

The primary objective of the workshop was to introduce participants to the rapidly evolving field of systems medicine, with a strong emphasis on the integration of advanced computational techniques,



such as deep learning, into medical research and practice. The workshop involved two intensive sessions covering deep learning and systems medicine.

# Guest Talk on Applications of AI in Healthcare

The Department of Electronics and Communication Engineering organized an online Alumni Guest Talk on 26 July 2024. Mr Ishan Devdatt Kawathekar, Data Scientist at DeepTek and alumnus of the department (Batch of 2021) delivered the session.

The session introduced the fundamental concepts of artificial intelligence for healthcare applications. The talk provided an overview of key topics within the realm of medical diagnostic imaging and deep learning. The speaker discussed practical challenges faced during developing AI models for healthcare and possible solutions to overcome it.



The Guest Talk was coordinated by Dr Anu Shaju Areeckal, Assistant Professor in Department of Electronics & Communication Engineering.

# Internal Hackathon for Smart India Hackathon (SIH 2024)

The Department of Instrumentation & Control Engineering hosted an Internal Hackathon on 17 September 2024, as a precursor to the prestigious Smart India Hackathon (SIH) 2024. The event was inaugurated by Dr Niranjan U C, Former Director of Research & Training at Manipal Dot Net Pvt Ltd, and Dr Sachi Bhat, CEO and Founder of Alar Innovations and Alar Labs. The faculty members of the department, including Dr Meenatchisundaram, Additional Professor, Dr Anjan Gudigar, Associate Professor, and Dr Sucheta Kolekar, Assistant Director of Innovation & Incubation attended the event alongside Dr Cyril Joseph, the SPoC for SIH 2024.

A total of 149 teams participated in the hackathon, addressing problem statements provided by industry leaders and government organizations. Among these, 126 teams registered for the software edition, presenting innovative ideas, while 23 teams focused on the hardware edition, showcasing their proof of concepts and solution designs. The event highlighted the enthusiasm of the student community to tackle real-world challenges through innovative approaches.



A panel of experts, including Dr Niranjan U C, Director of Research & Training, Manipal Dot Net Pvt Ltd, Dr Sachi Bhat, CEO and Founder of Alar Innovations and Alar Labs, Dr Meenatchisundaram, Additional Professor, Dr Anjan Gudigar, Associate Professor, Dr Kapil Sadani, Associate Professor, and Mr David Saladhana, Founder of Aion Health Solutions Pvt Ltd evaluated the teams. The hackathon served as a platform for encouraging creativity, collaboration, and problem-solving skills, laying a strong foundation for MIT's participation in the upcoming SIH 2024.

# Interaction with Prof Sateesha Krishnamoorthy on Research in Energy Technology

The Alumni Cell Public and International Relations, MIT, Manipal in collaboration with the Department of Mechanical and Industrial Engineering, hosted a distinguished faculty interaction with Prof Sateesha Krishnamoorthy, Professor and Chair of Energy Technology and Director of the Surrey UK National Ion Beam Centre at the University of Surrey on 16 August 2024.

Prof Krishnamoorthy delivered a presentation focused on research in the areas on nanomaterials processing, surface engineering, and battery recycling. Highlighting strategic partnerships with MAHE, he discussed collaborative research opportunities, particularly in ion irradiation and battery stress studies, inspiring young researchers to explore these advanced fields. The session also featured a robust Q&A segment, where Prof



Krishnamoorthy addressed questions on self-healing materials, renewable energy technologies, green hydrogen, and wastewater treatment techniques. Dr Arunachala U Chandavar, Professor and Head of the Department, delivered the welcome address, while Dr S S Sharma, Senior Professor delivered the vote of thanks. The event witnessed active participation from students, research scholars, faculty, and alumni.

# Lecture on MATLAB and Career Opportunities

Dr Yogananda Jeppu, Adjunct faculty of the Department of Instrumentation and Control Engineering delivered a lecture on essential topics such as MATLAB, Artificial Intelligence (AI), and career opportunities in the control systems domain to the PG students of the department on 23 September 2024.



# Session on E-Mobility and Sustainability

The Department of Mechanical and Industrial Engineering organized an interactive session on E-Mobility and Sustainability for seventh-semester students of the Mechanical and Industrial streams on 05 August 2024. The session featured Mr Sushil Reddy, an accomplished alumnus with a dual degree (MTech) in Energy Science and Engineering from IIT Bombay, and the founder of the SunPedal Ride initiative.

Mr Reddy, a Guinness World Record holder for the longest electric bicycle journey, who is currently on an 8000+ km expedition promoting clean energy and sustainable mobility shared his insights on E-Mobility. He covered topics such as charging infrastructure, battery safety, cost comparisons

between EVs and ICE vehicles, and carbon emission reduction. He also shared insights from his extensive electric car journeys and conducted spot quizzes, rewarding winners with prizes.

Dr Arunachala U Chandavar, Head of the Department, welcomed the audience and emphasized the significance of e-mobility in today's context.



The session was followed by a live demonstration of Mr Reddy's Morris Garages ZS Electric Car near the Innovation Centre, where he provided a comprehensive walkthrough of the vehicle's components, charging mechanisms, and maintenance tips.

# A Talk on Career Opportunities at Honeywell

The Department of Mechanical and Industrial Engineering hosted an enlightening session titled "Career Opportunities at Honeywell" on 24 August 2024, A distinguished industry expert, Mrs Mythili Belle Kamath, Director of Flight Systems COE in Aerospace at Honeywell, and an esteemed alumna of MIT delivered the session.

Mrs Kamath shared her professional journey and provided a comprehensive overview of Honeywell's global operations, highlighting various career paths, particularly in aerospace and flight systems. She discussed the key skills required to succeed in the aerospace industry, the importance of



engineering expertise, and opportunities for internships at Honeywell. Dr Arunachala U Chandavar, Head of the Department welcomed Ms Kamath and thanked her for interacting with the students of the department.

### Training session on 1DOF, CAN Emulators, and Power Analyzers

Mr Prasanth from Mew Technology, Bengaluru visited the department of Instrumentation and Control Engineering during 29-30 August 2024, to conduct a training session on 1DOF, CAN emulators, and power analyzers using MOKU.

During the training program, he discussed the details of various experiments related to the above technologies.



# Student Entrepreneurs Engage in Insightful Interaction

The Department of Mechanical and Industrial Engineering hosted an engaging session on Interaction with Student Entrepreneurs, focusing on start-up exposure and entrepreneurship on 16 October 2024. BTech students at the institute shared their entrepreneurial interests, discussing topics such as design innovations, the cashew business, women's entrepreneurship, and MBA aspirations. Guest speakers Mr Amit Kapur, Managing Director- Nanobubble India Co (NICO, Ex-Founder & Director of Everest Blowers Pvt Ltd & Everest Blower Systems Pvt Ltd, and an alumnus of the department (Batch of 1995) and Ms Ameeta, Vice President Corporate Strategy, IOTA Group Co, New Delhi enriched the session with insights from their professional journeys, emphasizing passion, relationship-building, and HR skills as keys to



success. The event was coordinated by Coordinated by Dr Vishwanath Managuli, Assistant Professor, and Dr Rakesh Sharma, Assistant Professor - Senior Scale, Department of Mechanical & Manufacturing Engineering, MIT. The event offered practical guidance for students keen on launching startups and navigating entrepreneurial challenges.

# Overcoming Stress: The Vivekananda Way

A guest talk titled "Overcoming Stress: The Vivekananda Way" was organized on 12 September 2024 by Shri Swami Atmashraddhananda (Head, Ramakrishna Mission, Kanpur) at MIT Manipal. The session aimed to provide valuable insights into personality development, mind control, and stress management, all inspired by the teachings of Swami Vivekananda.

Swami Atmashraddhananda in his talk discussed the sources and types of stress besides developing the right attitude towards the same to contain the bad stress. He also demonstrated simple relaxation technique to relieve the stress in the workplace which can be practiced by anybody. He also advised to develop a positive self-image, right attitude towards life, and practice detachment to handle stress effectively. Cdr (Dr) Anil Rana, Director, MIT Manipal, and Dr Somashekara Bhat, Joint Director, Manipal, who graced the occasion,



acknowledged the importance of such talks for the holistic development of employees and students. Dr Shankaranarayana Bhat, Associate Director (Faculty Development & Welfare), welcomed the resource person and participants to the event. Dr K Balakrishna, Professor and Coordinator, Department of Sciences, introduced the guest Swami Atmashraddhananda to the audience. The event concluded with the vote of thanks by Dr K Balakrishna.

# Al Assisted Course Building Using Coursera

The session on Al Assisted Course Building Using Coursera was organized by the Office of Associate Director (Faculty Development and Welfare) on 19 August 2024 at MIT, Manipal. The session was led by Mrs. Ramya Srinivasan, Customer Success Director from Coursera, who conducted an insightful demonstration of the Course Builder tool, highlighting the potential of AI in course development.

Mrs. Srinivasan's presentation covered the broad steps involved in using AI to build and enhance course content, emphasizing how these tools can make the teaching and learning process more effective and engaging. The session was highly



interactive, with participants actively engaging in clearing their doubts, and exploring the possibilities of implementing AI in their own course designs. The session proved to be an inspiring experience for many faculty members, encouraging them to experiment with AI-driven course building on the Coursera platform to enhance their teaching methodologies.

# Special Talk on "New Age Electric Power Grid"

Department of Physics, MIT Manipal, organized a technical talk under the Industry Advisory Committee (IAC) initiative on 12 September 2024. Dr Nagesh S Kini, Chief Technology Officer and Co-Founder of Vimano EWA Pvt Ltd, Bangalore delivered an engaging lecture titled New Age Electric Power Grid - The Role of Storage. His presentation highlighted the modernization of traditional power grids to accommodate renewable energy sources, improve efficiency, and ensure reliability. He explained the vital role played by energy storage in stabilizing and optimizing grid performance, enabling clean energy to be

accessible on demand. Dr Sudha Kamath, Professor and Head of the Department welcomed the speaker and participants. Dr Raghavendra K G introduced the speaker. Faculty members, MSc students, and research scholars attended the interactive session.



# Alumni Talk at the Department of Physics

The Department of Physics organized an Alumni Talk featuring Ms Anjana Uday, an alumna from the MSc Physics batch of 2015-17 and a PhD scholar at the Institute of Physics II, University of Cologne, Germany. The webinar, titled "My Journey from Manipal to Germany," was held in a virtual mode on 24 August 2024. Ms Anjana shared her experiences at MIT, Manipal, detailed her research work, and discussed the academic requirements for pursuing higher studies in Germany. She provided insights the research opportunities, university selection process, and benefits of studying in Germany compared to other countries. Ms Anjana also addressed the challenges faced by the international students and the preparedness required to pursue research programs international universities.

Dr Sudha Kamath, Professor and Head of the Department, welcomed the speaker and participants. While Dr Gurumuthy S C, Associate Professor introduced the speaker, Dr B V Rajendra, Alumni Coordinator, delivered the vote of thanks. A total of 30 participants, including students and research scholars, attended the event.

### Webinar on Material Devices

Department of Physics hosted its second webinar in 2024 focused on "Material Devices" on 02 September 2024. The event aimed to explore the applications and future research scope of material devices. Dr Rajesh Kumar, Associate Professor in Physics, IIT Indore delivered a session on "Electrochromic Smart Windows: Materials, Devices, and Multifunctional Applications." Dr Sudha D Kamath, Professor and Head of the Department of Physics welcomed the gathering and introduced the speaker. The webinar was attended by MSc students, research scholars, and faculty members. The event was coordinated by Dr Akhilesh Ranjan and Dr Vikash Mishra, faculty members of the department.



# Launch of Student Project video

Students Project video for Orientation 2024 was launched on 12 July 2024 by Lt Gen Dr M D Venkatesh, Vice Chancellor, MAHE, Manipal. Cdr (Dr) Anil Rana, Director, MIT, Dr Somashekara Bhat, Joint Director, MIT, Dr Ramachandra V Murty, Associate Director (Development), MIT & Mr Sachin Karanth Deputy Director, Directorate of PR, MAHE were present during the function. Mr Devicharan R, faculty for MIT, Manipal who edited the student project video was facilitated by Lt Gen Dr M D Venkatesh, Vice Chancellor, MAHE.



# Talk on Limitless Learners: Students Empowering Humanity Through Al

The Department of Electronics and Communication Engineering (E&C) and IEEE Student Branch Manipal at MIT Manipal organized an alumni talk titled "Limitless Learners: Students Empowering Humanity Through AI" on 05 September 2024, Ms Ambika Sharma, an alumna of the department and the Head of AI at Google USA delivered the talk.

Ms Ambika focused on the future scope of AI and how students can prepare themselves to contribute meaningfully to this rapidly evolving field. Dr Pallavi R Mane, Professor and Head of the Department, introduced Ms Ambika Sharma and



highlighted her remarkable journey from MIT Manipal to her current role at Google, USA.

# Talk on Embedded AI Systems

The Department of Electronics and Communication Engineering (E&C) hosted an engaging online alumni talk on the topic of "Embedded Al Systems" on 30 August 2024. Mr Abhishek Bhaduri, an alumnus of the department, who is currently working at Dell Technologies, Texas, USA delivered the special talk. The event was aimed at providing B.Tech. students with insights into the design, implementation, and current trends in embedded

Al systems. Abhishek provided an overview of the key components involved in the development of embedded Al systems, including hardware accelerators, specialized processors, and edge computing. He also highlighted real-world applications, such as autonomous vehicles, smart home devices, and industrial automation, where embedded Al is making a significant impact.

# Session on Pranayama and Yoga

The Department of Electronics and Communication (E&C) and the Department of Information and Communication Technology (ICT) jointly organized an alumni session on "Pranayama and Yoga Practice" on 08 August 2024. Ms Ashlesha, an alumna of the department (E&C Batch of 2014)

delivered the talk in a virtual mode on yoga and holistic wellness. The session involving live demonstration and practical insights was designed to impart knowledge on the benefits of pranayama and yoga.

# Guest Lecture Series on Electronic Cooling and Computational Fluid Dynamics

The Department of Mechanical & Industrial Engineering hosted a guest lecture series during 16-19 September 2024 on "Electronic Cooling and Computational Fluid Dynamics" (CFD). The lectures were delivered by Prof Ir Dr Mohd Zulkifly bin Abdullah from University Sains Malaysia (USM).

The series aimed to provide valuable insights into the field of electronic packaging, cooling technologies, and CFD applications, attracting participation from undergraduate and postgraduate students, faculty members, and PhD scholars. Prof Zulkifly, an expert in electronic cooling and packaging, shared his extensive knowledge on advanced CFD methods and thermal management techniques.

Over the course of four days, Prof Zulkifly covered a range of topics including numerical solutions for complex engineering problems, Lattice Boltzmann Method (LBM) and Molecular Dynamics (MD) simulations, and CFD applications in electronic packaging industries. Key discussions included fluid/structure interactions in flip-chip packaging, thermal analysis in reflow soldering, and the use of piezoelectric fan cooling for electronic components. The series also focused on battery thermal management for electric vehicles, highlighting innovations in lithium-ion battery cooling and hybrid nanofluids.

The lecture series concluded with a session on enhancing photovoltaic (PV) solar power, covering heat sink and reflector applications to improve PV cell efficiency. Prof Zulkifly's expertise and the technical depth of the sessions were well-received by all participants. The event also opened the door for potential collaborations between MIT, Manipal, and USM. The series culminated with a visit to MIT's student club centres, marking a successful exchange of knowledge and fostering international academic partnerships.

# Guest Lecture on Physiological Sensors and Cognitive Flow

The Department of Data Science and Computer Applications organized a guest lecture on "Using Physiological Sensors for Measuring Cognitive Flow and Other Chronic Healthcare Conditions" on 23 September 2024. Dr Tanvi Banerjee, Associate Professor, Department of Computer Science and Engineering at Wright State University, USA delivered the special lecture. The lecture focused on the application of physiological sensors in assessing cognitive states and managing chronic healthcare conditions, bridging the fields of computer science and healthcare innovation.

# Felicitation for Retired Staff of Electrical & Electronics Engineering Department

The Department of Electrical & Electronics Engineering organized a felicitation ceremony on 09 July 2024 to honor its retired staff members, Mr Jayaraj T and Ms Yashoda Amin.

The event celebrated their long and dedicated service to the organization as Mr Jayaraj completed 34 years of service and Ms. Yashoda Amin served for 33 years. Dr P Giridhar Kini, Registrar, MAHE, reminisced about working alongside the two, first as a student and later as a faculty member.

Cdr (Dr) Anil Rana, Director MIT, praised their commitment and extended his best wishes for a healthy and fulfilling retirement. Dr Somashekara Bhat, Joint Director MIT, highlighted Mr Jayaraj's calm demeanor and Ms Yashoda Amin's commanding presence, reflecting their distinct personalities and contributions to the department.

Dr Chandrashekara S Adiga, Head of the Department, welcomed the gathering and shared his views on the employee relationship with the department.



# Talks Organized by Department of Biomedical Engineering

# Career and Sales in MedTech



The Department of Biomedical Engineering organized a guest lecture on Career and Sales in MedTech Industry by Mr Amit Baxi Director, **Ethicon** Associate Wound Closure & Biosurgery Johnson and Johnson Mumbai, India on 07 August 2024.

# Career Opportunities in MedTech



The Department of Biomedical Engineering organized alumni talk on "Career Opportunities in MedTech" by Mr Prasanth Mangalapalli, (Batch of 2011) General Sales Manager, Ethicon, Johnson & Johnson, Mumbai, on 26 July 2024.

# **Neurology & Neuro Engineering**



The Department of Biomedical Engineering organized a guest lecture on Neurology & Neuro Engineering by Dr Subramanian Adjunct Professor, Mayo Clinic on 28 August 2024.



**Research Opportunities** The Department of Biomedical Engineering organized alumni talk on "Research Opportunities" by Mr Nayan Prakash (Batch of 2016) Research Scientist, Biosensor & Bioinstrumentation Lab, Indian Institute Technology Bombay on 31 August 2024.

#### **Heart-Lung Machines**



The Department of Biomedical Engineering organized a guest lecture on Heart-Lung Machines by Dr V S Venkatesan, Visiting Professor (International) on 13 August 2024.



### **DEPARTMENT ORIENTATION PROGRAM 2024**

### **AERONAUTICAL & AUTOMOBILE ENGINEERING**

The orientation program for the first-semester students of BTech Aeronautical Engineering was held on 20 July 2024 in the department. The forenoon session commenced with a departmental overview presented by Dr Pramod Salunkhe, Additional Professor, Department of Aeronautical & Automobile Engineering.

Dr Vishnu G Nair, Associate Professor, introduced the key features of the department, including its facilities and faculty. Dr Chandrakantha Bekal, Associate Professor provided the outline on the detailed BTech Aeronautical Engineering course curriculum, along with information on minor specializations and the BTech (Hons) program.



As a part of the Orientation program, Dr T G Pai, Adjunct Professor, delivered a special lecture on the "Scope of Aeronautical Engineering, Opportunities, and Future" to the students.

Further, Dr Yogeesha Pai, Assistant Professor-Senior Scale and Dr Srinivas G, Associate Professor of the department, conducted an interactive session, addressing the students' queries related to the program. In the afternoon, students under the guidance of Dr Anoop K and Dr Balbir Singh, Assistant Professor-Senior Scale, Department of Aeronautical & Automobile Engineering visited the various laboratories of the department, including the Avionics/Flight Simulation Lab, NVH Lab, Structures Lab, and Aerodynamics/Propulsion Lab.

The orientation program for first-semester BTech Automobile Engineering students was also held on 20 July 2024. Dr Chandrakant R Kini, Professor, provided a comprehensive overview of the department's focus and activities. Dr Laxmikanth G Keni, Associate Professor presented the course curriculum for BTech Automobile Engineering, discussing minor specializations and the BTech (Hons.) program. Dr Anand Pai, Associate Professor introduced the department's faculty, staff, and infrastructure. Dr Jayashish Pandey, Assistant Professor and Dr Ravindra Mallya, Assistant Professor-Selection Grade, facilitated a Q&A session, addressing the students' inquiries.

The highlight of the forenoon session was a talk by Dr Prakash Kamath, Head (Retd) - New Product Development, Mahindra, Chennai, on "Recent Advances in Automotive Engineering," that offered insights into the latest trends in the field.



The afternoon session included lab visits, where students explored the Engine/Transmission Lab, Composites/NVH Lab, Avionics/Flight Simulation Lab, and Aerodynamics/Propulsion Lab, under the guidance of Dr Manjunath Shetty, Assistant Professor and Dr Manish V Yadav, Assistant Professor-Senior Scale.

The Orientation Program for the first-semester MTech students of the Automobile Engineering, Avionics, Defence Technology, and Applied Computational Fluid Dynamics streams offered by the department was held on 08 August 2024. The event was presided over by Dr Dayananda Pai, Professor and Head of the Department of Aeronautical and Automobile Engineering.

The coordinators of the MTech programs, including Dr Mahesha GT, Dr Pramod Salunkhe, Dr Chandrakanth Bekal, and Dr Vishnu G. Nair, presented the course curricula and academic requirements specific to each specialization. Their presentations helped the new batch of students with an understanding of their academic journey and expectations.

#### **BIOMEDICAL ENGINEERING**

Department of Biomedical Engineering organized its Orientation Program for the new batch of students on 20 July 2024. This program aimed to introduce the students to the department's academic structure, faculty, placement opportunities, and student initiatives.



An unexamined life is not worth living.

Dr Niranjana S, Professor and Head of the Department, introduced the department's vision, mission, and placement opportunities to the newly inducted students. He also acknowledged the achievements of student performers and introduced the faculty members.

Dr G Muralidhar Bairy, Additional Professor, provided an overview of the academic structure, offering insights into course content, curriculum design, and evaluation methods. The Orientation program involved a special lecture by Dr Annapoorna K, Professor and Head of the Department of Yoga, on "Lifestyle Disciplines," emphasizing the importance of a balanced lifestyle and incorporating yoga practice in student life.



In the afternoon session, the students had an interactive discussion with Dr Jeevan M, Associate Professor, Dr Pramod K N, Assistant Professor - Selection Grade, and Dr Amritanshu Gupta, Assistant Professor. The discussions focused on the program's scope, career pathways, and nuances of academic journey. An alumni interaction followed, where Tushar Nayak shared his experiences virtually through MS Teams, shedding light on the IEEE EMBS chapter and his journey after graduation.



Additionally, fourth-year students, including Ms Poonguzhali, Ms Niveditha Bala, Ms Devika Poojary, and Ms Nilanjana Kuttappa, highlighted the activities of the BMESI Manipal Chapter and the department's student magazine, Biomed Chronicles. The program concluded with a guided tour of the department's laboratories, led by research scholars Mr Dhruva Darshan and Mr Samartha. During the tour, they provided insights into ongoing research projects and the facilities available to students, giving a practical glimpse into the department's research environment.

#### **BIOTECHNOLOGY**

Department of Biotechnology, MIT Manipal conducted an orientation program for the first-year BTech Biotechnology students on 20 July 2024. Dr Balaji S, Professor and Head of the Department, introduced the teaching staff, non-teaching members, and research scholars to the new batch of students.



In his address, Dr Balaji highlighted the department's commitment to experiential learning, creativity, and problem-solving, emphasizing how these focus areas align with the academic goals of the program. The highlight of the program was a special talk delivered by Dr Neha Gandhi, Professor, Department of Computer Science Engineering. Dr Neha shared insights into her extensive background in computational chemistry, drug discovery, and bioinformatics, and discussed the crucial role of STEM education in equipping students for future careers.



As part of the Orientation program, faculty members from the Department of Biotechnology presented their individual research areas, offering students a glimpse into the department's diverse expertise and research initiatives. Dr Balaji concluded the presentations by sharing highlights of the department's achievements and success stories of its alumni, demonstrating the potential career paths for students.

The session also included an introduction to the Institution of Engineers-Biotechnology (IE-Bt) Manipal Chapter, and a presentation about the International Genetically Engineered Machine (iGEM) competition. Students later visited the biotechnology laboratory facilities, where they received an overview of the equipment and ongoing projects.

#### CHEMICAL ENGINEERING

The orientation program for first year B Tech students in Chemical Engineering was held in the department on 20 July 2024. Dr M Srinivas Kini, Professor and Head of the Department, welcomed the newly joined students and provided an overview of the program.



This was followed by a session on 'Introduction to Engineering and Chemical Engineering' by Dr D V R Murthy, former Professor and Dean at NIT Surathkal. Dr B H V Pai, Professor, Department of Civil Engineering, delivered a session on 'Life at Manipal and Do's and Don'ts as an Engineer'.



The day concluded with a visit to the department laboratories and facilities under the guidance of faculty members Dr S V S R Krishna Bandaru, Dr V Ramesh, and Dr P Vairavel. The program aimed to provide students with insights into their academic journey and campus life.

#### **CHEMISTRY**

Department of Chemistry at MIT Manipal hosted an orientation program for the incoming first-year MSc Chemistry students on 30 July 2024. Dr Suma A Rao, Professor and Head of the Department, welcomed the new students, introduced the faculty and delivered an overview of the department's facilities. She highlighted the department's academic and research activities as well as the extracurricular opportunities available to students.

The event was facilitated by Dr Poornima Bhagavath, Associate Professor, who followed it with a detailed explanation of the MSc program's rules, regulations, course structure, and evaluation processes. During the program, Dr Murthy Dharmapur, Associate Professor - Research, gave an inspiring talk on "Building a Future Beyond

Chemistry," encouraging students to think about their long-term goals.



The program included a series of presentations by the faculty members that covered various aspects of the MSc curriculum and beyond. Dr Santosh L. Gaonkar, Professor, outlined the structure and expectations of the MSc project component. Dr Sudhakar Y N, Assistant Professor, introduced students to Massive Open Online Course (MOOC) platforms as valuable tools for self-learning and enhancing their knowledge base.

Dr N V Anil Kumar, Additional Professor, showcased notable alumni achievements, while Dr Dhanya Sunil, Professor, provided insights into the research facilities and opportunities available within the department. Dr Subrahmanya Bhat, Associate Professor, discussed career and placement opportunities for MSc graduates, offering guidance on how to navigate the job market.



The program concluded with an interactive session led by Ms Sonali, where alumni and research scholars engaged with the new students, sharing their experiences and insights into both academic and career paths. Later, under the guidance of Dr Akshatha R Shetty, Assistant Professor, and Mr Manjunath B S, Assistant Professor - Senior Scale the newly admitted students visited the department's facilities, including the MSc classrooms, MSc labs, and other research laboratories.



#### **CIVIL ENGINEERING**

Department of Civil Engineering held its orientation program for first-year undergraduate students on 20 July 2024. Dr Purushotham G Sarvade, Professor and Head of the Department, welcomed the students and provided an overview of the department's facilities and offerings. As part of the Orientation, Mr Ujwal D'souza, Director at O&A -Marian Projects Private Limited, Mangalore, delivered a special lecture where he shared his extensive experience in construction projects, challenges, real-life examples. discussing opportunities, and growth within the civil engineering field.



Interactive sessions facilitated by the faculty members played a key role in the orientation. A quiz activity was conducted by Dr Vishnu Unnikrishnan, Dr Amar Shinde, Assistant Professor and Dr Mahaswetha, Assistant Professor utilizing visuals and videos to engage students with civil engineering concepts. A group activity titled "Trash the Ball," led by Dr Binay Kumar Tripathi, Assistant Professor and Prof Rahul Narlanka, Assistant Professor focused on waste segregation using color codes, fostering environmental awareness.

Further, Dr B H V Pai, Professor delivered a special motivational lecture to the students on the importance of consistency throughout the academic journey. Additionally, a hands-on "Bridge-A-Thon" activity was conducted by Dr Arun Kumar, Assistant Professor - Senior Scale and Mr Anup Wilfred Sebastian, Assistant Professor - Senior Scale where students-built bridge models and tested their strength.



Department of Civil Engineering hosted an orientation program for third-semester BTech students on 22 July 2024. Dr Purushotham G Sarvade, Head of the Department welcomed the students and provided an overview of the academic curriculum, covering core courses, specializations, and credit requirements. Dr Anish Kumar Warrier,

Associate Professor shared insights from his research in Antarctica, inspiring students with his experiences. Faculty members introduced themselves and discussed various streams of civil engineering, helping students gain a better understanding of the department's academic strengths.



The session also included detailed discussions on placement opportunities and academic criteria by Dr Sugandhini H K, Assistant Professor - Senior Scale Dr Laxman P Kudva, Assistant Professor - Senior Scale and Mr Girish M G, Assistant Professor - Senior Scale Dr Binay Kumar Tripathi, Assistant Professor and Mr Praveen Kumar, Assistant Professor briefed students on the activities of the ASCE and IE Civil chapters, encouraging them to participate in club activities.

Department of Civil Engineering conducted an orientation program for the first-year MSc Geology students on 31 July 2024. Dr Purushotham G Sarvade, Professor and Head of the Department, welcomed the attendees, introduced department and its facilities. Dr K Balakrishna, Professor, presented an overview of the MSc Geology program, highlighting advancements in the field. Dr Anish Kumar Warrier, Professor, discussed the course structure, internship opportunities, and dissertation requirements, offering guidance on how to navigate the program.



The session included a presentation by Dr Aditya Udayraj Joshi, Assistant Professor who showcased clips from previous fieldwork, demonstrating the practical aspects of the program and available placement opportunities. Dr Balakrishna S. Maddodi, Associate Professor explained the campus facilities, the National Service Scheme (NSS), and student clubs, emphasizing the holistic development of students.

Department of Civil Engineering hosted an orientation program for first-year MTech students on 29 July 2024. Dr Purushotham G. Sarvade, Professor and Head of the Department, introduced the department and its facilities. The highlight of

the event was a talk by Dr Babu Narayan K S, a retired professor from NITK Karnataka, who shared his extensive expertise in structures, construction engineering, management, and environmental engineering through real-life examples. Dr Kiran Kamath, Professor, presented a memento to Dr Narayan in appreciation of his valuable insights.



Course coordinators, including Dr Raghavendra Holla, Associate Professor (Construction Engineering and Management), Dr Gopinath, Professor (Structural Engineering), and Dr Jagadeesha Pai, Associate Professor (Environmental Engineering), introduced their respective courses and faculty members. Prof Girish M G, Assistant Professor - Senior Scale provided an overview of placement and internship opportunities available to MTech students.



The activities of the IE Civil and ASCE student chapters were introduced by Mr Arun Kumar Y M, Assistant Professor - Senior Scale and Dr Poornachandra Pandit, Assistant Professor - Senior Scale respectively. Additionally, Ms Janhavi Naik introduced the new AIKYAM junior senior connect program, aimed at fostering a collaborative environment among students.

# **COMPUTER SCIENCE & ENGINEERING**

The Department of Computer Science and Engineering conducted an orientation program for I year BTech (CSE and CSE-AIML) students in the department on 18 July 2024. It aimed to familiarize students with the department, expose them to the scope of computer science, and inspire them to explore opportunities for innovation and research.

The program featured several distinguished speakers who provided valuable insights from their respective fields. Mr Prakash Prabhu, Assistant General Manager at Manipal Technologies Limited, delivered a talk titled "Education: A Computer Science Perspective." This session provided students with a unique perspective on how non-

technical aspects can be integrated into their learning journey.



Mr Rithwik Nayak, the proprietor of Life Essentials Water Solutions in Udupi, shared his entrepreneurial journey, illustrating the power of innovation through practical examples of evolution in technology. He emphasized the importance of industry collaborations, drawing on his experience with Thermax, and encouraged students to explore similar opportunities for growth. Mr Prashant Hegde, a senior software engineer at Robosoft Limited, gave a talk covering topics from the fundamentals of algorithms to emerging fields like artificial intelligence and cybersecurity.

The orientation also featured a session on "Entrepreneurship and Product Development," where Ms Pallavi Behera, Founder - Purple Space Children's Library, Manipal shared her passion for "Minimalism and Sustainability." She described her journey towards embracing minimalism and her efforts in reusing and upcycling materials through her library, "Purple Space." Her story served as an inspiration for students interested in integrating sustainability into their entrepreneurial ventures.

Dr Nisha P Shetty, Assistant Professor - Senior Scale in the Department of Information and Communication Technology, engaged the audience focusing on ethics in Al. She discussed the biases inherent in large language models like ChatGPT, encouraging students to critically evaluate the ethical dimensions of their work in the Al domain.



Dr Lewlyn L R Rodrigues, former Head of the Department of Humanities and Management, delivered an engaging session on "Building a Research Culture, Leadership, and Motivation." This interactive session included discussions on literature reviews, identifying research gaps, defining problems, formulating questions, and setting objectives.

The orientation concluded with an inspiring talk by Mr Sachin Pai, Managing Trustee of the Dr T M A Pai Foundation who oversees multiple institutes along with the Manipal Skill Development Centre, Manipal. As Managing Director of Best Sellers Apparels Private Limited, he shared valuable insights on innovation and leadership, drawing from his extensive experience in entrepreneurship.



The orientation program for the MTech CSE and MTech CSIS students was held on 30 July 2024 in the department. The event began with a welcome address by Dr Krishnamoorthi Makkithaya, Professor & Head of the Department, who emphasized the importance of sincerity and commitment in the competitive academic environment.

Dr Harish S V, Class Committee Chairperson for the first semester MTech, provided an overview of the department's infrastructure, facilities, faculty, and academic programs. It was followed by a session by Mr Manoj R, placement coordinator from the department, who discussed internship and placement opportunities.

The session then transitioned into a research orientation led by Dr Ashalatha Nayak, Department Research Coordinator. She emphasized the significance of research in academia, detailing the facilities available, MAHE's research policies, and ethical considerations that students must be aware of during their research journey.

#### **DATA SCIENCE & COMPUTER APPLICATIONS**

The Department of Data Science and Computer Applications (DS&CA) organized an orientation program for the first-year students of the BTech in Data Science and Engineering from 17 July to 19 July 2024. It was aimed at introducing new students to the academic and research opportunities and thereby helping them build a foundation for their journey towards becoming global citizens.

The orientation program was conducted over three days involving various expert talks, interactive sessions, and activities aimed at giving the students a comprehensive understanding of their program and the opportunities ahead. On the first day of the event, Dr Radhika M Pai, Professor and Head of the Department of DS&CA provided an academic

overview to the students. She gave an overview of the department, course syllabus, and the BTech Honors program.



Following that, Dr Vidya Rao, Assistant Professor in the department, spoke about the importance of cybersecurity in smart networks, highlighting its applications and relevance in today's digital landscape. Parallel sessions included a session by Dr Poornima P K, Associate Director, Student Welfare on experiential learning and a session by Mr Dundesh S Chiniwar, NCC Officer and Assistant Professor, Department of Mechatronics, on NCC activities at MIT, Manipal.



Activities on 18 July 2024 focused on research and international opportunities. Dr Manohar M Pai, Senior Professor from ICT Department led a session on data analytics, intelligent technologies, and research, encouraging students to engage in research during their undergraduate studies.

Dr Ramakrishna M Associate Professor in the department, introduced study abroad options, while Mr Ganesh Nayak, Assistant Professor, Department of Instrumentation and Control Engineering, conducted a session on building resilience through outdoor activities.



The third day of the orientation, 19 July 2024, was dedicated to developing communication skills and a deeper understanding of the data science. Dr Smitha Nayak, Additional Professor, Department of

Humanities & Management, conducted a session on effective communication, incorporating practical activities. Dr Rohini R Rao, Associate Professor in the Department of Data Science and Computer Applications, provided an overview of data science and its applications, giving students insights into the field they are stepping into. The day concluded with a segment titled "Meet the Seniors," where the first batch of BTech Data Science students shared their experiences and answered questions related to academics, placements, and campus life.

#### **ELECTRONICS & COMMUNICATION ENGINEERING**

The Department of Electronics and Communication Engineering organized a one-day orientation program in the department for newly admitted students of the two BTech programs in Electronics and Communication Engineering (ECE) and Electronics (VLSI Design and Technology) on 19 July 2024. The program introduced the students to the department, academic programs, and support features.



Dr Pallavi R Mane, Professor and Head of the Department, delivered an overview of the ECE department, discussing curriculum guidelines, academic activities, placement statistics, and the department's facilities.

Following the department overview, a guest talk was delivered by Prof Alex James, who spoke on the "Significance and Future Scope of Electronics, VLSI, and Communication." His presentation covered the historical evolution of electronics, the differences between analog and digital design, and the applications of MOSFETs in mixed-signal designs.



The afternoon session involved two main activities: lab visits and team-building exercises. Research

scholars from the department and lab coordinators guided the students through the labs introducing them to the lab equipment, software, and research facilities.



The team-building sessions included interactive games designed to promote leadership, coordination, and communication skills. It was followed by performance by the students such as songs, dances, and beatboxing. Dr Anu Shaju Areeckal, Dr Rahul Ratnakumar, and Dr Akshatha K R, along with other faculty members and research scholars facilitated the events.

Department of Electronics & Communication Engineering conducted the Orientation Program - 2024 for the newly admitted post graduate students of MTech in Digital Electronics & Communication Engineering (DECE) and Microelectronics (ME) on 30 July 2024.

The event introduced students to the teaching-learning methodologies, academic processes, and the lab facilities available in the department. Highlights of the session included program structures, publication guidelines, lab resources, student clubs like IEEE and ISTE, and alumni achievements.



Students also explored the department's state-of-the-art laboratories through guided tours, gaining insights into the infrastructure supporting academic and research endeavours. Discussions also emphasized internship and placement opportunities. Further, students were encouraged to actively participate in initiatives like the department's "I-Connect" webinar series and contribute to the department newsletter BITS and BYTES.

In a special session, MTech Microelectronics students attended a live orientation conducted by Infineon Technologies, where they were introduced to the Infineon Technologies VIKSHA program.

#### **ELECTRICAL & ELECTRONICS ENGINEERING**

The orientation program for the first-year students of the Department of Electrical and Electronics Engineering (EEE) was organized on 19 July 2024 in the department. The event began with a guided tour of the department's facilities, including specialized laboratories and the department office.

Dr Shailesh K R, Associate Professor in the department, led the students through the facilities, providing them with an experience of the academic environment of the department.



In the afternoon, the orientation shifted to a presentation session where Dr Chandrashekara S Adiga, Professor and Head of the Department, provided an overview of engineering education. Dr Adiga highlighted the importance of balancing academic responsibilities with campus life and discussed opportunities for co-curricular engagement.



Following this, Mr James Antony Pinto, Assistant Professor - Senior Scale, offered insights into the infrastructure, research activities, and highlights of the student achievements of the department. The orientation concluded with a motivational session by Mr Satyakam, Assistant Professor - Senior Scale, who shared inspiring anecdotes from his own engineering journey. The entire program was coordinated by Dr Shivarudraswamy R, Professor and Dr Vinay Kumar Jadoun, Associate Professor in the department.

The Department of Electrical and Electronics Engineering organized an induction program for third-semester BTech Electrical & Electronics Engineering students on 07 August 2024. Cdr (Dr) Anil Rana, Director MIT, the chief guest of the event, encouraged the students to actively engage in research and make the best use of the allocated funds for student research initiatives. Dr Somashekara Bhat, Joint Director, MIT emphasized

the importance of strengthening technical domain knowledge. Dr Chandrashekara S. Adiga, Professor and Head of the Department, highlighted the need to prioritize academics and actively participate in student projects.



During the event, Dr Soham Dutta, Assistant Professor in the department made a presentation on the achievements of the department, facilities available, and opportunities for research-based learning in specialized domains. Dr Savitha G. Kini, Professor provided a detailed overview of the academic guidelines for the program. Following the inaugural session, visit to the department facilities was coordinated by the faculty members of the department.

Department of Electrical & Electronics Engineering organised an orientation program for the newly admitted MTech students of Power Electronics & Drives (PED) and Electric Vehicle Technology (EVT) on 03 August 2024.

Dr Vijayalaxmi, Associate Professor - Senior Scale and Class Committee Chairperson for the 2024-26 batch welcomed the students to the program and set the tone for the event. Dr Chandrashekara S Adiga, Professor and Head of the Department, provided an outline of the programs and emphasized the importance of engaging in meaningful research during the studies. Dr Lakshmanrao S Paragond, Associate Professor and Program Coordinator for PED, briefed on the resources and infrastructure available to support students in their academic and research pursuits.



Dr Jayalakshmi N S, Professor and Program Coordinator for EVT, oriented the students on academic regulations and the significance of quality publications. The orientation program

concluded with a vote of thanks delivered by Dr Vijayalaxmi. Following the formal event, a guided tour to the department facilities was organised under the supervision of Mr Vipin V, Assistant Professor in the department.

### **HUMANITIES & MANAGEMENT**

Department of Humanities and Management conducted a three-day orientation for the first-year BTech students in Computer Science and Financial Technology during 17-19 July 2024.

The program featured dynamic sessions aimed at immersing students in the BTech program. It began with an introduction by Dr Yogesh Pai, Head of the Department, who outlined the program's innovative curriculum and highlighted the expertise available.

Dr Srikanth Prabhu, Professor of Computer Science and Engineering, discussed the interdisciplinary nature and relevance of the BTech program, emphasizing its alignment with today's tech-driven landscape.

In the afternoon session Mr Venu Madhav, Senior Vice President, and his team from Fidelity Information Services Global, Bengaluru, provided insights into trends and opportunities in the FinTech industry.

The second day focused on providing valuable industry perspectives. It began with a session by Mr Muralidhar Kini, a Chartered Accountant from Manipal, on "FinTech & Stocks: A Simplistic Approach." His talk was followed by Ms Chaitra Rao's presentation on the emerging field of "Regulatory Technology" and its role in financial compliance.



The day concluded with an interactive "Unwind and Connect" session, led by Dr Smitha Nayak and Dr Praveen Shetty, faculty members from the department, providing a relaxed environment for students to build connections with peers.

The final day took a deep dive into the FinTech landscape, starting with a talk by Mr Tilak Hegde, Director at Fidelity Investments, who traced the evolution of FinTech and projected its future. Mr Arnav Agarwal, an MIT alumnus, shared his journey after graduation, offering practical guidance to the new students. The orientation concluded with a

campus tour, allowing students to explore their new environment and start building connections.

The Department of Humanities and Management at MIT Manipal organized a three-day orientation program for third semester BTech (Computer Science & Financial Technology) students. Dr Yogesh Pai P, Head of the Department provided an outline of the program to the students. The first day featured inspiring addresses from Chief Guest Mr Venu Madhav, Senior Vice President at FIS, and Guest of Honor Mr Ritesh Kumar Agarwal, Founder & CEO of INVOYZ Financial Solutions.



Cdr (Dr) Anil Rana, Director, MIT Manipal, delivered the presidential remarks, highlighting the importance of aligning academic training with industry needs. Mr Venu Madhav discussed the impact of industry trends on curriculum development, Mr Ritesh Kumar Agarwal focused on the world of FinTech entrepreneurship, and Dr Bharath Sureshkumar conducted a session on practical tips on academic writing.

Day two of the orientation emphasized hands-on learning, featuring a practical case study analysis session led by Dr Gururaj Kidiyoor, a Professor from TAPMI. This session enabled students to apply theoretical knowledge to real-world scenarios, deepening their understanding of FinTech concepts.

It was followed by a workshop on "Presentation and Pitching Skills" conducted by Dr Regina J Hoffmann, International Faculty at Department of Humanities and Management at MIT Manipal and a faculty member at Delft University of Technology. This workshop focused on helping students enhance their communication skills, equipping them with the tools needed to effectively present their ideas in academic and professional settings.



On the final day, Dr Regina J Hoffmann continued with a session on "Professional Business Etiquette," guiding students on the nuances of conduct in the

corporate world. The orientation concluded with a session by Dr Sumukh Hungund, Assistant Professor - Selection Grade at MIT Manipal, who provided insights into outcome-based education.



The Department of Humanities and Management at MIT, Manipal, conducted an orientation program on 29 July 2024, for the newly admitted MTech Engineering Management students. The event aimed to welcome the students and familiarize them with the academic and professional opportunities. The session featured Chief Guest Ms Mabelle Fernandes, an alumna of the MTech Engineering Management program (Batch of 2018-2020), who shared her experiences as an HR Analyst at Target Corporation.



Dr Yogesh Pai, Head of the Department, addressed the students highlighting the importance of skill acquisition in achieving their academic and career goals. Dr Mahesh Prabhu H, Assistant Professor - Senior Scale and program coordinator, provided an overview of the academics, highlighting coursework and project requirements. Dr Asish Oommen Mathew, Associate Professor, outlined various opportunities for internships, placements, and start-ups.

### INFORMATION & COMMUNICATION TECHNOLOGY

The Department of Information and Communication Technology (I&CT) hosted a well-structured orientation program in the department for newly admitted BTech students from 17 to 19 July 2024.

The program offered a series of meaningful sessions each day, tailored to provide students a holistic view of academic life, personal development, and preparation for their professional life at MIT. The program began on 17 July 2024 with a strong emphasis on mental health and interpersonal skills. Mrs Prathibha Lydia Braggs, Research Scholar at Manipal College of Nursing, opened the day with her talk on 'Mental Health'. She addressed stress

management, the importance of goal setting, and the significance of making informed choices.

Dr Umesh Tonse, Assistant Professor of Psychiatric Social Work at Kasturba Medical College, conducted an interactive workshop on "Interpersonal Relationship Skills." He highlighted the significance of skills such as empathy, active listening, and teamwork. Dr Shweta T S, Associate Professor and Head of Clinical Psychology at Manipal College of Health Professionals, presented a session titled "Pause for Perspective."



Dr Shweta focused on stress and anxiety management, particularly in academic settings. She offered problem-solving strategies and discussed the importance of understanding personal interests. The day concluded with a workshop on self-defence led by Shihan Dr Nishanth Bhat, a self-defence expert. His session, which included handson training in basic defence techniques, provided students with confidence and awareness in personal safety.

The second day of the orientation focused on helping students balance academic pursuits with extracurricular involvement, ethical considerations in AI, and adopting productive lifestyle practices. The day began with an Alumni Talk by Ms Muskaan Budhraja, who shared her journey as a former MIT student. She encouraged students to engage in campus activities like Revels and TechTatva while keeping academics at the forefront. Following this, Dr Nisha P Shetty, Assistant Professor - Senior Scale, presented a session on "Ethics and Morality in AI." She discussed the challenges of responsible AI development, including privacy issues and ethical frameworks.



The day concluded with a session by Dr Sanjay Singh, Professor in the I&CT Department, who delivered a motivational talk on 'Productive

Student Lifestyle.' Dr Singh introduced the OMM Model (Observation, Motivation, Mechanism) to help students align personal and academic goals, and shared time-management strategies such as Covey's Urgent-Important matrix.

The final day of the orientation focused on maintaining mental and physical well-being, with sessions on substance abuse prevention, healthy lifestyle practices, and stress management. It began with Dr Savitha Prabhu, Assistant Professor, Manipal College of Nursing, who conducted a session on "Prevention of Substance Abuse." She discussed the physical and psychological impacts of substance abuse and urged students to maintain healthy habits.



Dr Veeraj Praveen, an Ayurvedic doctor from Udupi, delivered a session on "Yoga and Ayurveda Lifestyle." Dr Praveen introduced students to the six pillars of health: balanced nutrition, hydration, exercise, sleep, stress management, and social connections.

The final session of the orientation, led by Dr Rayan and Ms Sujatha, MIT student counsellors, addressed "Handling Anxiety Issues." Through an interactive discussion, the counsellors highlighted the need to maintain a positive mindset and emphasized the importance of support networks.

The orientation program for new MTech students in Computer Networking & Engineering and Artificial Intelligence & Decision Science was held in the department on 29 July 2024.



Dr Smitha N Pai, Professor and Head of the Department, provided an overview of the department's mission and resources. Dr Poornalatha G, Additional Professor, gave details about research opportunities and publication processes. Dr Kaliraj S, Associate Professor, provided details on placement prospects and industry alignment, while Dr Sucheta Kolekar, Assistant Director (Innovation & Incubation) introduced the startup incubation centre and encouraged entrepreneurial pursuits.

Department of Information & Communication Technology organised an orientation program for third-semester students of BTech in Information Technology (IT) and Computer and Communication Engineering (CCE) was held on 25 July 2024. The session aimed to introduce students to the curriculum, research opportunities, and entrepreneurial support systems.

Dr Ajitha Shenoy, Professor and Class Committee Chair for third-semester CCE, welcomed the gathering. Dr Smitha N. Pai, Professor and Head of the Department, provided an overview of the department's history, highlighting notable achievements of students, alumni and faculty. Dr Sucheta Kolekar, Associate Professor and Assistant Director - Innovation & Incubation, outlined the activities of incubation centres and opportunities available for students.



Dr Kaliraj, Associate Professor & Department Placement Coordinator, shared detailed statistics on internships and placements, while Dr Poornalatha G, Additional Professor and Department Research Coordinator, introduced the research facilities and policies, emphasizing ethics and MAHE's guidelines for publications.

During the event, Dr Santhosha Rao, Additional Professor and CEO of MUTBI (Manipal Universal Technology Business Incubator), outlined entrepreneurial ventures, policies and support extended for start-ups. Dr Poornalatha G delivered the vote of thanks.

# **INSTRUMENTATION & CONTROL ENGINEERING**

The Department of Instrumentation and Control Engineering organized an orientation program for the newly admitted BTech students of Electronics and Instrumentation Engineering and Cyber Physical Systems. The event was designed to provide a comprehensive introduction to the department's academic processes, protocols, and available resources.



through the eyes of others.

The orientation included sessions on various academic elements, such as the curriculum, examination process and laboratory practices. Dr Shreesha C, Professor and Head of the Department provided a comprehensive outline of the program to students.

A key focus of the program was on placement opportunities and industry tie-ups. Students were exposed to potential career paths with leading companies such as Honeywell and Cisco, as well as partnerships with organizations like Schneider Electric and National Instruments.

The program also included guided tours of the department's laboratories, where students were introduced to the various facilities and equipment by the faculty members and lab coordinators.

Additionally, ice-breaking activities were conducted to encourage interaction among the new students, fostering a sense of community and collaboration.



The MTech orientation for the Embedded Control and Automation program was held on 29 July 2024 in the ICE Department. Dr Shreesha C, Head of the Department, introduced the students to the academic environment, departmental features, and the resources available to support their learning. Dr Santhosh K V, Professor in the department, emphasized the importance of research and publications.

Dr S Meenatchi Sundaram, Additional Professor in the department, highlighted start-up opportunities, including those at MIT and MAHE incubators, and discussed pathways to entrepreneurship.

#### **MECHANICAL & INDUSTRIAL ENGINEERING**

The Department of Mechanical & Industrial Engineering organized orientation program in the department for newly admitted BTech students in Mechanical and Industrial Engineering. The program aimed to introduce them to the department's academic process, research opportunities, and facilities.

Dr Arunachala U Chandavar, Professor and Head of the Department, and Dr S S Sharma, Senior Professor, provided students with an overview of the department's mission, faculty expertise, and academic expectations. Dr Raghuvir Pai B. Professor, and Dr Vishwanath Managuli, Assistant Professor - Selection Grade, conducted an engaging session on the "Importance of Research in Undergraduate Education."



After this, the faculty members of the department introduced students to the diverse streams within Mechanical and Industrial Engineering, including Design, Manufacturing, Materials, Thermal, and Industrial Engineering.



The session also included video presentations by representatives from the department's alumni network and student clubs, such as ASME Manipal and IE (Mechanical). These videos highlighted the achievements of past students, ongoing projects, and club activities, encouraging first-year students to get involved in these extracurricular opportunities. As part of the orientation program, students were taken on a tour of institute facilities.

The orientation program successfully acquainted first-year Mechanical and Industrial Engineering students with their department's academic process, research potential, and campus facilities.

#### **MECHATRONICS**

The orientation for first-year BTech in Mechatronics students was organized in the department on 19 July 2024. Dr D V Kamath, Professor and Head of the Department, provided an in-depth overview of the Mechatronics program, covering its history, faculty profiles, accreditations, lab facilities, research domains, and career opportunities.



Following this, Dr Abhishek Kumar Kashyap, Dr Deepak D, and Dr Vijay Babu Koreboina, faculty

members of the department led discussions focusing on essential components of mechatronics systems, including sensors, actuators, and robotics, emphasizing their integration with computer science. The faculty members also introduced their individual research interests, enhancing the students' understanding of the diverse expertise within the department.



Further, Dr Vijay Babu, Associate Professor and Dr Nikhil Pachauri Assistant Professor in the department highlighted the research facilities available to students, the placement processes, and options for pursuing higher studies, including opportunities abroad. The orientation concluded with a guided tour of the departmental lab facilities.

The third-semester orientation was held on 22 July 2024. Dr D V Kamath outlined the department, faculty, research and facilities. Dr Vijay Babu Koreboina, Associate Professor discussed the available research facilities. Dr Ishwar Bhiradi, Assistant Professor- Senior Scale, provided insights into the placement process and opportunities for higher studies.

Mr D A P Prabhakar, Assistant Professor introduced the ISA student club and other extracurricular clubs, highlighting the significance of participation in student clubs and activities. Dr Deepak D, Professor, led a session focused on the Precision Agriculture as a minor specialization.



Additionally, an MIT alumnus, Mr Neehal Sharma (batch of 2018-2022) shared valuable advice on career and skill development during an online interaction with him. The final session, conducted by Dr Narendra Khatri, Assistant Professor covered industrial training guidelines, objectives, and opportunities for students.

#### **MATHEMATICS**

The orientation program for BTech in Mathematics and Computing students was held in the Department of Mathematics during 18-20 July 2024. The program featured a series of insightful sessions, starting with briefings by Dr Kuncham Syam Prasad, Head of the Department of Mathematics, and Dr Radhika Pai, Head of the Department of Data Science & Applications.

Dr Kuncham Syam Prasad outlined the department's history, vision, and the curriculum for BTech in Mathematics and Computing. Dr Radhika Pai, then detailed the Data Science & Engineering program, emphasizing its interdisciplinary approach, industry relevance, and collaboration opportunities.



As part of the orientation program, several key lectures were organized for the students. Dr B R Shankar, Professor, MACS, NITK, Surathkal delivered a special lecture on the synergy between mathematics and computing. Dr Kedukodi Babushri Srinivas, Professor in the department conducted a session on mathematics and computing.



Dr Srikanth Prabhu, Professor, Department of Computer Science & Engineering, highlighted practical applications in engineering, while Prof Vinay Madhusudan, Assistant Professor, Department of Mathematics, demonstrated essential mathematical software. The event also featured a motivational talk on scientific thinking by Dr Ravi Prakash, Associate Director (Academics) and Professor in the Department of Physics.



Dr Sudarsan N S Acharya, Assistant Professor at the Manipal School of Information Sciences, shared his insights on linear algebra, while Dr Ajitha Shenoy, Professor in the Department of Information & Communication Technology, introduced problemsolving and Algorithms.



Further, Mr Raghavendra Bhat, Intern at Wolfram Research Inc, University of Illinois, Urabana-Champaign (UIUC, USA) delivered a special lecture on computational mathematics during the event. Additionally, Ms Kushi Kapoor, a student in the department shared her experiences during the orientation program.

#### **PHYSICS**

Department of Physics organized an orientation program for the first-year MSc students of the 2024-26 batch on 30 July 2024. The event aimed to introduce the newly enrolled students to the department and familiarize them with the academic regulations pertaining to the program.



Dr Sudha Kamath, Professor and Head of Department welcomed the guests and provided an overview of the department, facilities, and activities. Dr Sudha introduced faculty members and explained the rules and regulations of the



restructured MSc program and the evaluation process.

Following this, several key sessions were delivered by the faculty members of the department. Dr Dhananjaya Kekuda spoke on research facilities, Dr Nagaraja K K talked on MSc project work, Dr Rajendra B V highlighted alumni achievements, Dr Mamatha D Daivajna elaborated on placement and internship opportunities, Dr Ismayil introduced the Physi-spectra newsletter, Dr Sandeep Suchand deliberated on industry-academia connections, and Dr Raghavendra K G spoke on the Nano to Infinity Club.







Further, four research scholars shared their experiences in the department. Guest speakers, Dr Harinakshi Karkera, Assistant Professor, Department of Mathematics, and Dr Dhanya Sunil, Professor, Department of Chemistry, delivered engaging sessions on "Goal Setting" and "Research Opportunities," respectively.



The program concluded with a vote of thanks delivered by Dr Bhaghyesh, the Coordinator of MSc Physics program. The students were provided with a guided tour of various facilities of the institute.

#### **FACULTY ACHIEVEMENTS**

#### Dr Shobha shines at Aceh International Orienteering Championship, Indonesia

Dr Shobha M E, Associate Professor, Department of Mathematics achieved a remarkable milestone at the Aceh International Orienteering Championship held on Sabang Island, Indonesia, during 6-8 September 2024. After winning the national orienteering event in Mumbai this May, she earned the opportunity to represent India on this international platform, becoming the first Indian woman to do so.

Dr Shobha made history by winning a gold medal in the middle category and a silver in the sprint category. The middle variant, spanning 3.8-4 km with 10 control points, took participants through villages, forest areas, and beaches of the island. The sprint category, covering 2.8-3 km with 14 control points, was held in the main city, featuring landmarks and monuments, where she narrowly missed the gold by just 40 seconds. Dr Shobha was awarded with a prize money of 29 lakh and 23.5 lakh Indonesian rupiah, respectively for her achievements in the event.

In addition to the above achievement, Dr Shobha ME won the first place in Bhadra Trail Race of 12 kilometers organized by Forest Department, Chikamagaluru on 22 September 2024. She also successfully completed the challenging 30 km Sinhagad Epic Trail race held on 29 June 2024 in Pune finishing within the cutoff time of 8 hours and 20 minutes. She achieved an impressive 8th place in the women's category.





#### Vishnu Sharma Atikukke receives award for the start up



Vishnu Sharma Atikukke, Assistant Professor in the Department of Civil Engineering and an entrepreneur, has been honored with the prestigious ELEVATE 2023 award by the Karnataka Innovation & Technology Society, Department of Electronics, IT, BT, and S&T, Government of Karnataka in the Clean Technology category for his initiatives with the start-up, Replastiko Pvt Ltd. from MIT Manipal. This recognition bolsters the team to further explore innovative approaches to simplify recycling processes, with the aim of implementing these solutions in other regions as well.

#### Documentary on Bhutardhane directed by Dr Praveen Shetty receives Award



Documentary produced by Manipal academy of Higher Education under the project 'Living Cultures of Tulunadu and directed by Dr Praveen Shetty, Assistant Professor - Selection Grade, Department of Humanities and Management titled 'Bhuta' bagged the Best Film Award under Social Practices Category in the Culture Cinema International Film Festival (C2F2) on 25 August 2024 in Mumbai. This was selected out of the 800 documentaries submitted to the festival.

C2F2-in-the-Campus is a unique program designed to reach the vibrant youth from colleges and universities across India to experience, appreciate, and engage with the cultures that define our world. As a part of this program, Culture Cinema Film Festival (C2F2) takes films to universities in a physical format, where the Award-Winning films from the Official Selection of the festival are shown to the students at the university on campus.

#### Dr I Thirunavukkarasu receives Best Paper Award



Dr I Thirunavukkarasu, Professor, Department of Instrumentation & Control Engineering, received the Best Paper Award for his paper titled "Identification of Batch Reactor Process Using Extreme Learning Machine-Based Hammerstein and Hammerstein-Wiener Models" at the International Conference on Thermofluids and Manufacturing Science organized by the Department of Mechanical Engineering, Kalinga Institute of Industrial Technology (KIIT), Bhubaneswar, and held from 08-09 March 2024.

#### Dr Asha and Dr Jeane receive Best Paper Award

Dr Asha C S, Associate Professor, and Dr Jeane Marina D'Souza, Assistant Professor - Selection Grade from the Department of Mechatronics, received the Best Paper Award for their paper titled "Voice-Controlled Object Pick and Place for Collaborative Robots Employing the ROS2 Framework" at the 2024 International Conference on Advances in Modern Age Technologies for Health and Engineering Science (AMATHE 2024) organized by PES Institute of Technology and Management (PESITM), Shivamogga, Karnataka, held during 16-17 May 2024.





#### MUTBI becomes implementation agency for the GENESIS program



Dr Santhosha Rao, CEO of MUTBI, and his team won accolades by MeitY, Government of India. MUTBI has been chosen as an Implementation Agency for the Gen-Next Support for Innovative Startups (GENESIS) program by MeitY, Government of India. Among 65 incubators selected across India, MUTBI stands ready to support startups in the electronics and IT sectors. The other start-ups selected under this program include AIC-SMUTBI and two more from Karnataka namely Deshpande Startups-Hubli, Sahyadri Hub for Innovations and Entrepreneurship-Mangaluru.

#### Dr Thirunavukkarasu delivers lectures at PVKK Institute of Technology, Anantapur



Dr I Thirunavukkarasu, Professor, Department of Instrumentation and Control Engineering, delivered two special lectures during the Five-Day Faculty Development Program (FDP) on "Artificial Intelligence Integrated Green Wireless Communication and Sensor Technologies" held at PVKK Institute of Technology, Anantapur, an Autonomous Institute under JNTU on 27 September 2024. His lectures were titled "Machine Learning Concepts for Advanced Control Implementation via Wireless Communication using Jetson Orin" and "Cyber Physical System Implementation on Batch Reactor via Nodes and Virtual Reality using Unity Pro & Blender".

#### Dr Harinakshi honored with the "Outstanding New Zone Trainer Award"



Dr Harinakshi Karkera, Assistant Professor, Mathematics, was honored with the "Outstanding New Zone Trainer Award" during training conference - Inspire 2024 by Zone XV, Junior Chamber International India on 29 September 2024. The award was given in recognition of her contributions as a trainer to educating and empowering students at schools, colleges and commitment to making a positive impact on society.

#### Dr Shilpa Edits Springer Publication Book



Dr Shilpa Suresh, Assistant Professor, Mechatronics, along with Dr Shyam Lal, Department of Electronics and Communication Engineering, NITK, Surathkal, and Mustafa Servet Kiran, Department of Computer Engineering, Konya Technical University, Konya, Türkiye edited the Springer publication of the book on "Intelligent Control, Robotics, and Industrial Automation"— Proceedings of the International Conference, RCAAI 2023.

# MAHE INTER COLLEGIATE STAFF CHESS TOURNAMENT 2024

Dr Gurumurthy, Associate Professor, Department of Physics, MIT, Manipal, clinched the 3rd place at the MAHE Inter Collegiate Staff Chess Tournament 2024 held on 28 August 2024.



# Winners at MAHE INTER COLLEGIATE STAFF BADMINTON TOURNAMENT 2024

The following is the summary of the winners of the badminton tournament held on 01 September 2024, from MIT Manipal.

#### Teaching MEN SINGLES Below 40 Years:

Dr Chethan K N, Associate Professor, Department of Aeronautical & Automobile, secured the first place in the Teaching Men Singles Below 40 Years category.



#### Teaching MEN DOUBLES Below 40 Years:

The dynamic duo of Dr Chethan K N, Associate Professor, Department of Aeronautical & Automobile and Dr Gurumurthy, Associate Professor, Department of Physics, secured the first place in the Teaching Men Doubles Below 40 Years event.





#### Teaching WOMEN DOUBLES Below 40 Years:

Ms Preeti Mohanty, Assistant Professor - Senior Scale, Department of Instrumentation & Control Engineering and Dr Ramya S Moorthy, Assistant Professor, Department of Mechatronics clinched the first place in Teaching Women Doubles Below 40 Years.





#### **Teaching MIXED DOUBLES:**

Dr Prateek Jain, Associate Professor, Department of Electrical & Electronics Engineering and Prof Preeti Mohanty, Assistant Professor - Senior Scale, Department of Instrumentation & Control Engineering earned the runners-up position in the Teaching Mixed Doubles event.





#### Teaching MEN SINGLES Above 40 - Below 55 Years:

Dr Gurumurthy, Associate Professor, Department of Physics won the first place in the Teaching Men Singles Above 40 - Below 55 Years category.



Teaching & Non-Teaching MEN SINGLES Above 55 Years: Dr Shivarudra Swamy, Professor, Department of Electrical & Electronics Engineering secured the runners-up in the Teaching & Non-Teaching Men Singles Above 55 Years category.



Non-Teaching MEN SINGLES Above 40 - Below 55 Years:

Mr Kiran Kumar, General Duty Worker, Department of Physical Education, MIT emerged as the winner in the Non-Teaching Men Singles Above 40 - Below 55 Years category.



Non-Teaching MEN DOUBLES Above 40 - Below 55 Years:

Mr Ashok Rao, Deputy Chief Security Officer, MIT Security and Mr Kiran Kumar, General Duty Worker, Department of Physical Education, MIT won the first place in the Non-Teaching Men Doubles Above 40 - Below 55 Years category title





#### Teaching & Non-Teaching MEN DOUBLES:

The dynamic duo of Mr Ashok Rao, Deputy Chief Security Officer, MIT Security and Dr Vishwas Saralaya, Associate Professor, Department of Microbiology, KMC, Mangaluru secured the first place in the Teaching & Non-Teaching Men Doubles category.





#### Teaching & Non-Teaching MEN DOUBLES:

The duo of Dr Manohara M M Pai, Senior Professor, Department of Information & Communication Technology, MIT, Manipal and Dr Kumar B R, Additional Professor, Department of Anatomy, KMC, Manipal secured the second place in the Teaching & Non-Teaching Men Doubles category.





#### TOP 2 PERCENT RESEARCHERS FROM MIT

Two faculty members of MIT, Manipal featured in the league of top two percent researchers for their Career Contribution and sixteen faculty members of the institute figured in the list for the Single Year Contribution published by Stanford University.

#### **CAREER CONTRIBUTION**



Dr Kulmani Mehar

Assistant Professor

Mechanical & Industrial Engineering



**Dr Ranjeet Kumar Mishra** Associate Professor - Research Chemical Engineering

#### SINGLE YEAR CONTRIBUTION



**Dr Ranjeet Kumar Mishra** Associate Professor - Research Chemical Engineering



**Dr Raja S**Professor
Chemical Engineering



**Dr Ramesh V**Professor
Chemical Engineering



Mr Nithesh Naik
Assistant Professor - Senior Scale
Mechanical & Industrial Engineering



**Dr Thivaharan V**Additional Professor
Biotechnology



**Dr Shiva Kumar**Professor
Mechanical & Industrial Engineering



**Dr Tanweer**Associate Professor
Electronics & Communication Engineering



**Dr Kulmani Mehar**Assistant Professor
Mechanical & Industrial Engineering



**Dr Dinesha P**Professor
Mechanical & Industrial Engineering



Dr Raghavendra U Associate Professor Instrumentation & Control Engineering



**Dr Ravilla Dilli**Associate Professor
Electronics & Communication Engineering



**Dr Dhanya Sunil** Professor Chemistry



**Dr S Varadharajan** Assistant Professor - Senior Scale Civil Engineering



**Dr Amit Kumar Goyal** Assistant Professor - Senior Scale Electronics & Communication Engineering



**Dr Madhusudan Kulkarni** Assistant Professor Electronics & Communication Engineering



**Dr Rajesh Mahadeva**Associate Professor
Computer Science & Engineering

#### ENRICHING INSTITUTE LEADERSHIP DIMENSIONS



**Dr KARUNAKAR A KOTEGAR**Designate Pro President, MUJ

Dr Karunakar A Kotegar joined Manipal University, Jaipur on 3<sup>rd</sup> October 2024 as Designate Pro President and will be taking over the charge as Pro President, MUJ with effect from November 01, 2024. Dr Karunakar is currently Director, International affairs at Manipal Academy of Higher Education, Manipal.



**Dr S V S R KRISHNA BANDARU** Associate Director - Quality Assurance

Dr S V S R Krishna Bandaru, Professor, Department of Chemical Engineering, is appointed as Associate Director - Quality Assurance for a period of two years from 01 August 2024.



**Dr RAVIPRAKASH Y** Associate Director - Academics

Dr Raviprakash Y, Professor, Department of Physics, is appointed as Associate Director - Academics for a period of two years from 01 August 2024.



**Dr ASHOK RAO**Associate Director - Central Analytical Instrumentation Facility

Dr Ashok Rao, Professor, Department of Physics, is appointed as Associate Director - Central Analytical Instrumentation Facility (CAIF) for a period of two years from 01 August 2024.



**Dr DHANYA SUNIL**Assistant Director (Technical) - Central Analytical Instrumentation Facility

Dr Dhanya Sunil, Professor, Department of Chemistry, is appointed as Assistant Director (Technical)-Central Analytical Instrumentation Facility (CAIF) for a period of two years from 01 August 2024.



**Dr VISHWANATH MANAGULI**Assistant Director (Administration) - Central Analytical Instrumentation Facility

Dr Vishwanath Managuli, Assistant Professor-Selection Grade, Department of Mechanical & Industrial Engineering, is appointed as Assistant Director (Administration) - Central Analytical Instrumentation Facility (CAIF) for a period of two years from 01 August 2024.

#### ENRICHING INSTITUTE LEADERSHIP DIMENSIONS



**Dr RADHIKA M PAI**Head of the Department of Data Science & Computer Applications

The tenure of Dr Radhika M Pai, Head of the Department of Data Science & Computer Applications is extended for three years from 01 August 2024.



**Dr PURUSHOTHAM G SARVADE**Head of the Department of Civil Engineering

The tenure of Dr Purushotham G Sarvade, Head of the Department of Civil Engineering is extended till 31 May 2025.



**Dr Rajesh Nayak** Assistant Director - Student Welfare

The tenure of Dr Rajesh Nayak, Assistant Director-Student Welfare is extended for one year from 01 August 2024.



**Dr ISHWAR BHIRADI**Assistant Director - Industrial Liaison, Placement & Practice School

The tenure of Dr Ishwar Bhiradi, Assistant Director - Industrial Liaison, Placement & Practice School is extended for one year from 17 September 2024.



**Dr SANDESH UPADHYAYA K** Assistant Director - Development

The tenure of Dr Sandesh Upadhyaya K, Assistant Director-Development is extended for one year from 17 September 2024.



**Dr SAMPATH KUMAR V S**Assistant Director - Academics

The tenure of Dr Sampath Kumar V S, Assistant Director-Academics is extended for one year from 21 September 2024.

#### **ENRICHING INSTITUTE LEADERSHIP DIMENSIONS**



**Dr KRISHNA PRAKASHA K**Assistant Director - Alumni, Public & International Relations

The tenure of Dr Krishna Prakasha K, Assistant Director-Alumni, Public & International Relations is extended for one year from 01 October 2024.



**Dr ASHWINI BHAT**Assistant Director - Student Welfare

The tenure of Dr Ashwini Bhat, Assistant Director-Student Welfare is extended for one year from 01 October 2024.



**Dr VISHWANATHA H M**Assistant Director - Quality Assurance

The tenure of Dr Vishwanatha H M, Assistant Director-Quality Assurance is extended for one year from 20 October 2024.



**Dr SUHAS Y NAYAK** Workshop Superintendent

The tenure of Dr Suhas Y Nayak, Workshop Superintendent is extended for one year from 01 September 2024.





in your absence

#### PhD AWARDEES: FACULTY MEMBERS



#### Dr SPOORTHI SINGH

Assistant Professor - Senior Scale, Department of Mechatronics Engineering,

and Full-time Research Scholar in the Department of Aerospace Engineering, UPM, Malaysia, successfully defended her Doctoral thesis titled "DESIGN AND CONTROL IMPLEMENTATION OF FLAPPING MECHANISM FOR INSECT-SIZE ROBOFLIERS" for the award of PhD degree by the University Putra Malaysia (UPM), Malaysia, on 29 February 2024. The research work was guided by Dr Kamarul Arifin Ahmad, Professor, Department of Aerospace Engineering, UPM, Malaysia, and co-guided by Dr Mohammad Zuber, Professor, Department of Aeronautical and Automobile Engineering, MIT Manipal.



Dr H K SUGANDHINI

Assistant Professor - Senior Scale, Department of Civil Engineering,

successfully defended her Doctoral thesis titled "DURABILITY PROPERTIES OF NO AGGREGATE CONCRETE SUBJECTED TO AGGRESSIVE ENVIRONMENTS" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 06 July 2024. The research work was guided by Dr Gopinatha Nayak, Professor, and co-guided by Dr Kiran Kumar Shetty M, Professor, Department of Civil Engineering, MIT Manipal.



Dr ARUN KUMAR Y M

Assistant Professor - Senior Scale, Department of Civil Engineering,

successfully defended his Doctoral thesis titled "STUDIES ON HELICAL GROOVED REINFORCED CONCRETE PILE IN COHESIONLESS SOIL" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 19 August 2024. The research work was guided by Dr Kiran Kumar Shetty M, Professor and co-guided by Dr A Krishnamoorthy, Former Professor, Department of Civil Engineering, MIT Manipal.



Dr C SIVANANDA REDDY

Assistant Professor, Department of Electronics & Communication Engineering,

successfully defended his Doctoral thesis titled "ASYNCHRONOUS MOTOR IMAGERY BASED BCI SYSTEM CONTROLLED BY A BRAIN-SWITCH" for the award of PhD degree by the Indian Institute of Technology Madras on 21 August 2024. The research work was guided by Dr S Ramakrishnan, Professor, Department of Applied Mechanics, IIT Madras.



Dr VRUNDA N KATAGI

Assistant Professor, Department of Biotechnology,

successfully defended her Doctoral thesis titled "CO-PRODUCTION OF LIPASE AND POLYHYDROXYALKANOATE FROM BACTERIA USING RENEWABLE RESOURCES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 23 August 2024. The research work was guided by Dr Divyashree M.S., Associate Professor and co-guided by Dr V Ramachandra Murty, Senior Professor, Department of Biotechnology, MIT Manipal.



Dr HILDA MAYROSE

Assistant Professor - Senior Scale, Department of Biomedical Engineering,

successfully defended her Doctoral thesis titled "COMPUTATIONAL INTELLIGENCE TECHNIQUE FOR THE SCREENING OF DENGUE BASED ON PERIPHERAL BLOOD SMEAR IMAGES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 24 August 2024. The research work was guided by Dr G Muralidhar Bairy, Additional Professor and co-guided by Dr Niranjana S, Professor & Head, Department of Biomedical Engineering MIT Manipal, Dr Sushma Belurkar, Additional Professor, Department of Pathology and Dr Kavitha Saravu, Professor & Head, Department of Infectious Diseases, KMC Manipal.



Dr SUJA T P

Assistant Professor, Department of Civil Engineering,

successfully defended her Doctoral thesis titled "RESPONSE CONTROL OF A TENSION LEG PLATFORM USING PASSIVE DAMPER" for the award of PhD degree by the Indian Institute of Technology, Madras on 02 September 2024. The research work was guided by Dr Srinivasan Chandrasekaran, Professor, Department of Ocean Engineering, IIT Madras.



#### Dr PRAVEEN KUMAR P

Assistant Professor, Department of Civil Engineering,

successfully defended his Doctoral thesis titled "EFFICIENCY AND EFFECTIVENESS STUDIES FOR PERFORMANCE EVALUATION IN PUBLIC TRANSPORT SYSTEMS" for the award of PhD degree by the NITK Surathkal on 20 September 2024. The research work was guided by Dr Varghese George, Professor and co-guided by Dr Raviraj H Mulangi, Associate Professor, Department of Civil Engineering, NITK Surathkal.

#### PhD AWARDEES: FULL TIME RESEARCH SCHOLARS



#### Dr P VAIDEHI NAYANTARA

Full-time Research Scholar, Department of Instrumentation & Control Engineering, successfully defended her Doctoral thesis titled "COMPUTER AIDED DIAGNOSIS SYSTEM FOR DETECTION AND CLASSIFICATION OF LIVER TUMOR USING COMPUTED TOMOGRAPHY IMAGES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 01 July 2024. The research work was guided by Dr Surekha Kamath, Professor, Department of Instrumentation & Control Engineering, MIT Manipal and co-guided by Dr Manjunath K N, Associate Professor, Department of Computer Science & Engineering, MIT Manipal and Dr Rajagopal KV Professor & HOD, Department of Radio Diagnosis, KMC Manipal.



#### Dr NEETHU ELIZABETH JOHN

Full-time Research Scholar, Department of Civil Engineering,

successfully defended her Doctoral thesis titled "BEHAVIORAL ASSESSMENT STUDY OF HIGH-RISE RCC BUILDINGS WITH HYBRID OUTRIGGER SYSTEM" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 04 July 2024. The research work was guided by Dr Kiran Kamath, Professor, Department of Civil Engineering, MIT Manipal.



Dr MANOJ T

Full-time Research Scholar, Department of Computer Science & Engineering,

successfully defended his Doctoral thesis titled "A TRUSTED AND TRANSPARENT MULTISOURCE DATA FRAMEWORK FOR AGRICULTURAL RISK MANAGEMENT" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 06 July 2024. The research work was guided by Dr Krishnamoorthi Makkithaya, Professor and HOD and coguided by Dr Narendra V G, Professor, Department of Computer Science & Engineering, MIT Manipal.



#### Dr REDKAR SHWETA ANAND

Full-time Research Scholar, Department of Data Science & Computer Applications, successfully defended her Doctoral thesis titled "AN INTELLIGENT PREDICTION MODEL FOR DRUG-REPURPOSING USING SOFT COMPUTING TECHNIQUES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 15 July 2024. The research work was guided by Dr Hareesh K S, Director, ICAS, Manipal and co-guided by Late Dr Alex Joseph, Associate Professor, MCOPS, Manipal and Dr Sukanta Mondal, Associate Professor,

Bioinformatics and Computational Biology, BITS Pilani, Goa.



#### Dr ANUBHAV KUMAR PANDEY

Full-time Research Scholar, Department of Electrical & Electronics Engineering, successfully defended his Doctoral thesis titled "INVESTIGATION OF ECONOMIC FEASIBILITY OF A VIRTUAL POWER PLANT" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 27 July 2024. The research work was guided by Dr Vinay Kumar Jadoun, Associate Professor and co-guided by Dr Jayalakshmi N S, Professor, Department of Electrical and Electronics Engineering, MIT Manipal.



#### Dr AISHWARYA LAKSHMI

Full-time Research Scholar, Department of Civil Engineering,

successfully defended her Doctoral thesis titled "EFFECT OF SYNTHETIC FIBERS ON PRESTRESSED CONCRETE BEAMS SUBJECTED TO CORROSIVE ENVIRONMENT" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 09 August 2024. The research work was guided by Dr Poornachandra Pandit, Associate Professor, Department of Civil Engineering, MIT Manipal.



#### Dr RAJANI SALVANKAR

Full-time Research Scholar, Department of Mathematics,

successfully defended her Doctoral thesis titled "IDEAL LIKE SUBSTRUCTURES IN N-GROUPS AND RELATED GRAPH THEORETICAL ASPECTS" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 10 August 2024. The research work was guided by Dr Kuncham Syam Prasad, Professor and HOD and co-guided by Dr Kedukodi Babushri Srinivas, Professor and Dr Harikrishnan P K, Professor, Department of Mathematics, MIT Manipal.



Dr JOJU GEORGE SEBASTIAN

Full-time Research Scholar, Department of Civil Engineering,

successfully defended his Doctoral thesis titled "HOLOCENE CLIMATE VARIABILITY RECONSTRUCTED FROM LACUSTRINE SEDIMENTS OF SCHIRMACHER OASIS AND LARSEMANN HILLS, EAST ANTARCTICA" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 10 August 2024. The research work was guided by Dr Anish Kumar Warrier, Associate Professor, Department of Civil Engineering, MIT Manipal.



Dr SOWRABH B S

Full-time Research Scholar, Department of Mechanical Engineering,

successfully defended his Doctoral thesis titled "SYNTHESIS AND CHARACTERIZATION OF MODIFIED T6-AA7075 MATRIX-BASED GRANITE POWDER AND SILICON NITRIDE PARTICULATES REINFORCED COMPOSITES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 16 August 2024. The research work was guided by Dr Shivaprakash Y M, Additional Professor, Department of Mechanical & Industrial Engineering and co-guided by Dr Gurumurthy B M, Associate Professor, Department of Mechanical & Industrial Engineering, MIT Manipal.



Dr NANDINI K K

Full-time Research Scholar, Department of Electrical & Electronics Engineering,

successfully defended her Doctoral thesis titled "OPTIMAL LOCATION OF ELECTRIC VEHICLE CHARGING STATION IN GRID TIED DC MICROGRID WITH POWER QUALITY IMPROVEMENT" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 20 August 2024. The research work was guided by Dr Jayalakshmi N S, Professor and co-guided by Dr Vinay Kumar Jadoun, Associate Professor, Department of Electrical and Electronics Engineering, MIT Manipal.



Dr SOHANI BHAT G

Full-time Research Scholar, Department of Biotechnology,

successfully defended her Doctoral thesis titled "PRODUCTION AND EXTRACTION OF BACTERIAL POLYHYDROXYALKANOATES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 31 August 2024. The research work was guided by Dr Divyashree M S, Associate Professor and co-guided by Dr Thivaharan V, Additional Professor, Department of Biotechnology, MIT Manipal.



#### Dr KRISHNARAJ CHADAGA

Full-time Research Scholar, Department of Computer Science & Engineering, successfully defended his Doctoral thesis titled "DIAGNOSIS AND ASSESSMENT OF COVID-19 WITH SMART HEALTH CARE AND SEVERITY CLASSIFICATION USING MACHINE LEARNING" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 03 September 2024. The research work was guided by Dr Srikanth Prabhu, Professor and coguided by Dr Vivekananda Bhat K, Additional Professor, Department of Computer Science & Engineering, Dr Niranjana S, Professor & Head, Department of Biomedical Engineering, MIT Manipal and Dr Shashikiran Umakanth, Professor, Dr TMA Pai Hospital, Udupi, Melaka Manipal Medical College, Manipal.



#### Dr YAMUNA BHAGWAT

Full-time Research Scholar, Department of Civil Engineering,

successfully defended her Doctoral thesis titled "INVESTIGATION OF FLEXURAL BEHAVIOR ON CORRODED PRESTRESSED SELF COMPACTING CONCRETE BEAMS" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 04 September 2024. The research work was guided by Dr Gopinatha Nayak, Professor, Department of Civil Engineering, MIT Manipal.



#### Dr SHREEPANNAGA

Full-time Research Scholar, Department of Aeronautical & Automobile Engineering, successfully defended his Doctoral thesis titled "STUDY OF FATIGUE LIFE, EROSION BEHAVIOUR AND HYDRODYNAMIC FORCES ON QUASI-ISOTROPIC CARBON FIBRE REINFORCED COMPOSITES UNDER THE INFLUENCE OF MARINE ENVIRONMENT" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 13 September 2024. The research work was guided by Dr Dayanand Pai K, Professor and Head, Department of Aeronautical & Automobile Engineering and co-guided by Dr M Vijaya Kini, Professor, Department of Mechanical & Industrial Engineering and Dr Padmaraj N H, Associate Professor, Department of Aeronautical & Automobile Engineering, MIT Manipal.



Dr DEVAKI B

Full-time Research Scholar, Department of Mathematics,

successfully defended her Doctoral thesis titled "A STUDY ABOUT A CLASS OF BOUNDARY VALUE PROBLEMS USING SEMI-ANALYTICAL TECHNIQUES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 25 September 2024. The research work was guided by Dr Nithyananda P Pai, Professor, Centre for Advanced Research in Applied Mathematics and Statistics, MAHE and co-guided by Dr Sampathkumar V S, Associate Professor, Department of Mathematics, MIT Manipal.



Dr SHREESHA S

Full-time Research Scholar, Department of Information & Communication Technology, successfully defended his Doctoral thesis titled "DEVELOPMENT OF FPGA BASED SMART SYSTEM FOR BEHAVIORAL ANALYSIS OF COMMERCIALLY IMPORTANT FISHES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 27 September 2024. The research work was guided by Dr Manohara M Pai, Senior Professor, Department of Information & Communication Technology and co-guided by Dr Radhika M Pai, Professor and HOD, Department of Data Science and Computer Applications, MIT Manipal and Dr Ujjwal Verma, Associate Professor and Head, Department of Electronics & Communication Engineering, MIT Bengaluru.



Dr SONALI GUPTA

Full-time Research Scholar, Department of Chemistry,

successfully defended her Doctoral thesis titled "PIPERAZINE BASED ANTIMICROBIAL POLYMERS AND THEIR COATING STUDIES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 28 September 2024. The research work was guided by Dr M P Yashoda, Professor, Department of Chemistry, MIT Manipal.



#### Dr VIDYA KAMATH

Full-time Research Scholar, Department of Computer Science & Engineering, successfully defended her Doctoral thesis titled "DEVELOPING A DEEP LEARNING ARCHITECTURE FOR OBJECT DETECTION AND TRACKING IN APPLICATIONS FOR RESOURCE CONSTRAINED DEVICES" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 28 September 2024. The research work was guided by Dr Renuka A, Professor, Department of Computer Science & Engineering, MIT Manipal.



#### Dr CHIRANJEEVI H S

Full-time Research Scholar, Department of Information & Communication Technology, successfully defended his Doctoral thesis titled "NOVEL TECHNIQUE FOR PERFORMANCE ENHANCEMENT AND EVALUATION OF INFORMATION RETRIEVAL IN SEARCH ENGINES FOR HYBRID CUSTOMER RELATIONSHIP MANAGEMENT" for the award of PhD degree by the Manipal Academy of Higher Education, Manipal on 30 September 2024. The research work was guided by Dr Manjula Shenoy K, Professor, Department of Information & Communication Technology, MIT Manipal.

#### Memorandum of Understanding

- MIT, Manipal, MAHE, signed an MoU with Ingersoll Rand Technologies and Services Private Limited, Bengaluru on 20 August 2024 at MAHE, Manipal. The MoU primarily facilitates the provision of Consultancy and Non-Disclosure Agreement for subsonic wind tunnel and compact hear exchangers. The MoU is valid for 02 years.
- MIT, Manipal, MAHE, signed an MoU with Schneider Electric Private Limited, New Delhi on 10 September 2024, at MAHE, Manipal. The MoU primarily facilitates research and mutual area of collaborations. The MoU is valid for 02 years.
- MIT, Manipal, MAHE, signed an MoU with Eplan Software Pvt Ltd world's leading global German company on 29 August 2024, at MAHE, Manipal. The MoU primarily facilitates access to Eplan software for the major student projects of Formula Manipal Electric, SolarMobil, and Team Manipal Racing Electric at MIT. The MoU also allows access of essential tools for electrical schematic and wire harness design of the electric Formula Racing Car being developed by the team at MIT, Manipal. The MoU is valid for 01 year.

#### Centre of Excellence

A Centre of Excellence for E-Mobility was established under MAHE, Manipal and attached to Department of Electrical and Electronics Engineering, MIT Manipal on 15 July 2025. The aim of the centre is "To strive for excellence in providing knowledge and solutions in the field of E-Mobility, contributing to sustainable development and fostering sustainability for the present and the future." Mr Adarsh S, Assistant Professor, Department of Electrical and Electronics Engineering is the coordinator for the centre.

#### Visits to the Institute

- Mr Anvit Phatak, Director at Millennium National School, Pune and his colleagues visited MIT, Manipal on 23 July 2024.
- Dr Alex James, Dean Academic, Professor at Digital University Kerala visited MIT, Manipal on 26 July 2024.
- Mr Tilak Hegde, Director at Fidelity Investments and an alumnus of the institute (Computer Science Engineering, Batch of 2004) visited MIT, Manipal on 26 July 2024.
- > Dr Upendra Natarajan, Professor, Department of Chemical Engineering, IITM visited MIT, Manipal on 29 July 2024.
- Ms Deepti Arora, Scientist / Joint Director, from the Bureau of Indian Standards Govt of India visited MIT, Manipal on 29 July 2024.

#### RESEARCH HIGHLIGHTS

#### Dr Muralikrishna receives a research grant from MeitY, Gol

Dr Muralikrishna S N, Assistant Professor - Senior Scale, Department of Computer Science and Engineering, has been awarded a research grant of amount INR 1,96,72,000/- for the project proposal titled "COIL-D: Centre for Indian Language Data" by the Ministry of Electronics and Information Technology (MeitY), Government of India in the month of September 2024. The project aims to create language resources for Human Language Technology (HLT) and develop applications, standards, guidelines, and usages for building MT systems, benchmarking MT systems, and a few other NLP tools.

MIT is responsible for developing parallel corpora for Dravidian languages Kannada, Tamil, Malayalam, and Telugu. The project is to be executed in consortium mode led by IIT Patna. The other partnering institutions are IIT Delhi, IIIT Guwahati, IIIT Delhi, IGDTUW, Digital India Bhashini Division DIC and MIT Manipal. The total allocation for the project is 27,30,28,000/- (Twenty-seven crore thirty lakh twenty-eight thousand) and MIT is allocated 1,96,72,000/- (One crore ninety-six lakhs seventy-two thousand). The duration of the project is 2 Years.



Dr M Jeevan, Associate Professor, Department of Biomedical Engineering, as Principal Investigator (PI), has received a research grant of INR 28,49,810/- from the Anusandhan National Research Foundation (formerly known as SERB) for the project titled "Prototype Development to Detect and Study Substance Abuse Based on Non-invasive, Non-contact Iris Analysis Using Deep Learning Techniques." Dr Omkar S Powar, Assistant Professor, Department of Biomedical Engineering, is the Co-Principal Investigator (Co-PI) for the project.

#### Dr Surekha receives MRB Research grant

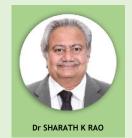
Dr Surekha Kamath, Professor, Department of Instrumentation & Control Engineering with her PhD student Ms Sonal P Almeida as Co-PI have been awarded the MRB Research grant of INR 8,00,821/- for their proposal titled "AI based Rectal Cancer Detection and Classification".

#### Ms Preeti & Team receives seed money for project

Ms Preeti Mohanty, Assistant Professor - Senior Scale, Department of Instrumentation & Control Engineering as PI has received seed money of INR 7,00,000/- for the proposal titled "Enhancing Home-based Rehabilitation for Knee Stiffness Post Total Knee Replacement: A Novel Approach with Wearable Motion Sensor Device." Dr Bhagya R Navada, Assistant Professor - Senior Scale Department of Instrumentation & Control Engineering, Dr Sharath K Rao, Pro-Vice Chancellor - Health Sciences, MAHE and Professor, Department of Orthopaedics KMC Manipal, Dr Rajesh Navada G V, Assistant Professor, Department of Physiotherapy, MCHP were the Co-PIs for the project.















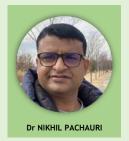


#### Dr Manohara M Pai and team receives three grants from Schneider

Dr Manohara M Pai, Senior Professor, Department of Information & Communication Technology, Mr Chenchu Saibabu P, Assistant Professor - Senior Scale, Department of Instrumentation & Control Engineering, Dr Nikhil Pachauri, Assistant Professor, Department of Mechatronics Engineering and Mr Nevin Augustine, Assistant Professor - Senior Scale, Department of Instrumentation & Control Engineering received an industry grant of INR 12,74,400/- from Schneider for the project titled "Exploratory Research in Industrial Automation and IoT Intelligent Technologies" under MU Indian Grant.









Dr Manohara M Pai, Senior Professor, Department of Information & Communication Technology, Dr Radhika M Pai, Professor and HOD, Department of Data Science and Computer Applications and Dr Rohini R Rao, Associate Professor, Department of Data Science and Computer Applications received an industry grant of INR 13,57,000/- from Schneider for the project titled "Exploratory Research in Agile Al Model Development and Cascaded Super Learning" under MU Indian Grant.







Dr Manohara M Pai, Senior Professor, Department of Information & Communication Technology, Dr Sudhakar Y N, Assistant Professor, Department of Chemistry, Dr Radhika M Pai, Professor and HOD, Department of Data Science and Computer Applications, Dr Selva Kumar M, Associate Professor, Department of Chemistry, Dr Murthy Dharmapura, Associate Professor - Research, Department of Chemistry, Dr Prateek Jain, Assistant Professor, Department of Electrical and Electronics Engineering and Dr Veena Mayya, Associate Professor, Department of Information & Communication Technology have received an industry grant of INR 20,77,036/- from Schneider for their project titled "Exploratory Research in Energy Storage." under the MU Indian Grant.















Dr Rajesh publishes a research article with Impact Factor of 6.3 Dr Rajesh J, Assistant Professor - Senior Scale, Department of Biotechnology, has published a research article titled "Efficient Removal of Hexavalent Chromium from Wastewater Using a Novel Magnetic Biochar Composite Adsorbent" in the Journal of Water Process Engineering, published by Elsevier (Impact Factor: 6.3).



#### Sensing & Remediation Research Centre (SRRC)

The Sensing and Remediation Research Centre (SRRC) established at MIT, Manipal (Old Chemical Engineering block), focuses on advancing sensor technologies and remediation strategies to address environmental challenges. SRRC is funded by various funding agencies like ICMR, SERB, AICTE, VGST and MAHE.

The research activity in the facility encompasses the development of innovative sensing assay capable of detecting contaminants at trace levels by utilizing cutting-edge technologies such as micro and nanoscale sensors. The optical and electrochemical sensors are designed to monitor environmental parameters in real-time, providing critical data for effective remediation efforts.

In addition to sensor development, the lab is used to investigate various remediation techniques, including adsorption and advanced oxidation processes. By integrating sensor data with remediation processes, it aims to enhance the efficiency and effectiveness of environmental clean-up operations.

The interdisciplinary approach at the center combines expertise from fields such as chemistry, engineering, and environmental science, fostering collaboration to tackle complex environmental issues.

The laboratory is organized into several compartments such as wet lab, electrochemical workstation, screen printing room, microbiology room and optical room, each designed to facilitate specific research activities. The wet lab is equipped with photocatalytic reactor, cooling centrifuge, dip coater, syringe pumps, and multiple furnaces.

The lab is designed for conducting experiments related to chemical reactions and material

synthesis. Adjacent to it, the optics room specializes in optical sensing techniques, employing methodologies like localized surface plasmon resonance (LSPR), evanescent waves, and various forms of spectroscopy including Raman and near-infrared (NIR).

It is equipped with advanced spectrophotometers that facilitate comprehensive analyses of environmental contaminants, enhancing the detection capabilities for a wide range of analytes.

The electrochemical workstation supports studies on electrochemical sensing techniques such as cyclic voltammetry (CV) and electrochemical impedance spectroscopy (EIS), utilizing precision instruments like Autolab and Palmsens Potentiostats to detect pollutants like antibiotics and food toxins.

The screen-printing room is tailored for fabricating substrates for optical and electrochemical sensors, featuring a custom-built screen-printing system along with equipment for mixing materials and curing inks.

The microbiology room is dedicated to the preparation and analysis of biological samples, ensuring a sterile environment with equipment such as a laminar airflow system, incubator shaker, and autoclave for sterilization. This facility collectively enhances research capabilities across multiple scientific domains.

The key investigators involved in the lab are Dr Nethaji S & Dr Harshini Dasari, Associate Professors from the department of Chemical Engineering, Dr Kapil Sadani, Associate Professor from Department of Instrumentation & Control Engineering and Dr Pooja Nag, Associate Professor from Department of Mechatronics.



#### STUDENTS IN ACTION

#### **Team Cryptonite Shines in Global Cybersecurity Competitions**

Team Cryptonite excelled in two prestigious Capture the Flag (CTF) competitions, showcasing their cybersecurity prowess on a global stage. In the CSAW CTF Qualification Round 2024 hosted by New York University's NYUSEC in online mode during 06- 09 September 2024, Cryptonite placed 61st globally out of 1,181 teams. Additionally, Team Cryptonite secured an outstanding 4th place globally in the CISA ICS CTF 2024, organized by the U.S. Cybersecurity and Infrastructure Security Agency (CISA) ICSJWG from 31 August to 04 September 2024.

#### Cryptonite Triumphs at ShunyaCTF Organized by MIT-ADT Pune

The student project team, Cryptonite, won the prestigious ShunyaCTF competition - an event related to cyber security, organized by the 'nCreeps' team from MIT ADT University, Pune. The event, which began with an online round featuring 229 teams from across the country, brought together top cybersecurity talent that included students and professionals. Cryptonite emerged victorious out of the top 21 teams that advanced to the offline final event held at MIT Art, Design & Technology University (MIT ADT), Pune on April 14, 2024.



The winning team composed of Prashanth J Kumar (Information Technology), Madhav Menon (Computer and Communication Engineering), Jayapal Ashwin Nair (Computer Science and Artificial Intelligence), Barri Harshith (Computer Science and Engineering), and Aayush Barhate (Electronics and Communication Engineering).

#### Team RoboManipal Achieves AIR 22 at DD RoboCon 2024 in New Delhi

Team RoboManipal, representing MIT Manipal, showcased their technical prowess at the DD RoboCon 2024, held at Thyagraj Stadium, New Delhi, during 13-14 July 2024. The team earned the title of Group Leader and secured an impressive All India Rank (AIR) 22 in the event.



#### Swarm Robotics Team Shines at Technoxian 2024

The Swarm Robotics team from MIT Manipal, including Anish V R, BTech - Electronics & Communication Engineering, Zaosh Khambata, BTech - Aeronautical and Automobile Engineering and Barani Illango, BTech - Mechanical and Industrial Engineering won accolades at Technoxian 2024, held during 24 - 27 August 2024 at the Noida Indoor Stadium, Delhi. The team participated in three challenging competitions: RC Aircraft, Drone Search and Rescue, and Drone Soccer. Swarm Robotics secured Second Place in Drone Soccer event and won a cash prize of ₹25,000. In the Drone Search and Rescue competition, the team finished in 4th place.



#### Team Flight Forge Wins 2nd Place at NACDeC-VII

Team Flight Forge from MIT Manipal secured Second Place at the VII National Aerospace Conceptual Design Competition (NACDeC-VII), organized by The Aeronautical Society of India. Competing against 45 teams from across the nation, the team presented a highly innovative design for a Martian UAV, tackling a challenging problem statement from the Indian Space Research Organisation (ISRO). The team was composed of final year students from Aeronautical Engineering - Kanak Agarwal, Aditya Singh, Parth Jain, Vedant Vijaykrishnan, and Pranav Karkera.



#### Chemical Engineering Students Win First Prize in Paryavaran 2024

BTech Chemical Engineering students from MIT, Manipal, secured first place in the poster presentation at the Paryavaran 2024 event, held at MS Ramaiah Institute in Bengaluru on 14 September 2024. Their project, titled "Bioinspired Metal-Organic Framework-Based Nanocomposites for Carbon Dioxide Reduction to Solar Fuels," earned them a cash prize of ₹10,000. The team involved Ms Dona Aristo J, Ms Batchu Radhika Krishna, Ms Santusti Gour from Department of Chemical Engineering, who worked in the VGST Centre of Excellence funded by the Government of Karnataka.



#### Project Dronaid Team Secures 1st Position in Design Implementation

Project Dronaid Team participated in the IMechE UAS Challenge 2024 at BMFA Buckminster, UK during 1 to 4 July 2024. Out of 38 teams that participated, their fixed wing aircraft model stood 1<sup>st</sup> in Design Implementation, 3<sup>rd</sup> in Asia, 5<sup>th</sup> in Business Case and 22nd Globally.



#### Team Outdoor Studies Completes 9th Edition

Team Outdoor Studies successfully completed the 9<sup>th</sup> edition of its Certificate Course in Outdoor Leadership. As part of the finale, the team embarked on an exhilarating cycling expedition through the Charmady Ghat in Chikmagaluru district.

Over the course of three days, the team cycled a total of 180 kilometers, covering the route from Charmady to Kottigehara, Kalasa, Kudremukh, Mala, and finally back to Manipal.



#### Tejas Rao Publishes Photo book 'Winged Beauties'

Mr Tejas Rao, a second-year student of Information Technology has compiled a photo book 'Winged Beauties'. Tejas, a naturalist at Centre for Outdoor Studies (COS), MAHE has helped the team identify over 70 different bird species and cycled to the hills of Sikkim.



#### Kanishk Kaushal and Team Achieve Milestone at ST TechWeek Hackathon 2024

Kanishk Kaushal, a final year Electronics and Communication Engineering (ECE) student achieved a significant milestone during his internship at ST Microelectronics. Alongside his team members at ST Microelectronics (Akanksha, Madhur, Ranjit, and Tanuj), Kanishk excelled in the ST TechWeek Hackathon 2024, a prestigious event that brought together top minds to address real-world challenges in VLSI Design. The hackathon focused on tackling critical problems faced by VLSI engineers, particularly in the areas of memory selection and placement, which directly impact essential design metrics like speed, area, and power consumption. Kanishk and his team worked to develop a solution at the architectural level that optimized the above parameters.



#### Yash Mayur Doshi Wins 'Best Paper Award' at 22<sup>nd</sup> ISME-International Conference

Mr Yash Mayur Doshi, a student of BTech in Mechanical Engineering received the "Best Paper Award" at the 22nd ISME-International Conference on "Recent Advances in Mechanical Engineering for Sustainable Development." held at Delhi Technological University from 11- 13 July 2024, in collaboration with the International Society of Mechanical Engineers (ISME). He received this award for the research paper titled "Thermal Analysis for Breast Cancer Detection Using Infrared Thermography," co-authored by his supervisor Dr Nidhul K, Assistant Professor, Department of Mechanical & Industrial Engineering.



#### Swikriti Wins "Future Research Talent Award" from Australian National University

Ms Swikriti Saket, a student in BTech Biotechnology from MIT Manipal, has been honored with the prestigious "Future Research Talent Award" by the Australian National University (ANU). She was recognized for her collaborative research with Professor Peter Solomon, Lab Leader, Wheat Biosecurity, Director, ARC Training Centre in Plant Biosecurity, Division of Plant Sciences, Australian National University, focusing on the mechanistic basis of fungal diseases in wheat. The Future Research Talent Award is part of ANU's Future Research Talent Program, which offers outstanding students from top institutes the opportunity to engage in a 12-week research stint at ANU.



#### Navmarg Research and Innovation Wins Manthan 2024

Navmarg Research and Innovation has emerged as the winner of the 16<sup>th</sup> edition of MANTHAN 2024, a prestigious Business Plan Presentation competition organized by FKCCI (Federation of Karnataka Chambers of Commerce and Industry) in the month of June 2024. Navmarg Research and Innovation Pvt Ltd is a student-led start-up founded by Shambhavi Sinha, a first-year BTech student in Information and Communication Technology at MIT, MAHE, and Arpit Kumar, a first-year B.Sc. Physics (Honors) student from the Department of Atomic and Molecular Physics, MAHE. Incubated at the Innovation Center, MAHE, Navmarg Research and Innovation exemplifies the idea of social entrepreneurship to address global challenges. The start-up team emerged as one of 390 finalist teams out of 9,400 teams worldwide at the Hult Prize Global Summit 2024 held at SDA Bocconi Asia Center, IIT Bombay during 07-09 June 2024.





#### Ms Megha & Ms Pradamya Secure Runner-Up Position in MechAura-2024

Ms Megha M Nair and Ms Pradamya Mahajan, third-year BTech Mechanical Engineering secured the 1st Runner-Up position in Mechaura-2024, a national-level competition hosted by RTX Corporation and the Pratt & Whitney India Engineering Center in Bangalore. The competition, exclusively for third-year female students in Mechanical and allied branches, attracted around 700 participants from across the country.

The competition featured three challenging rounds: an online test, a design dexterity challenge, and a technical & HR interview. Megha and Pradamya's performance in these rounds earned them the prestigious runner-up position, along with a Samsung Tablet as part of their prize. Their achievement also includes an exciting opportunity: a summer internship at Pratt & Whitney, followed by a six-month internship next year.





#### Ms Adithya Prakash receives Best Oral Presentation Award

Ms Adithya Prakash, research scholar from the Department of Physics, MIT Manipal, received the Best Oral Presentation Award for her work at the 4<sup>th</sup> International Conference on Advanced Materials Synthesis, Characterization, and Applications (AMSCA-2024), held at Queensland University of Technology, Brisbane, Australia, during 25-27 September 2024. The award, sponsored by Wiley Publications, recognizes her research conducted under the mentorship of Dr Mahesha M G, Associate Professor, MIT Manipal.



#### Mr Pradeep Nayak receives Best Poster Award

Mr Pradeep Nayak, a Senior Research Fellow in the Physics Department at MIT Manipal, received the Best Poster Award at the 8th International Conference on Functional Materials and Devices (ICFMD-2024) organized by University Malaya held in Kuala Terengganu, Malaysia during 6-8 August 2024. Pradeep Nayak's research, titled "Chitosan-Poly (vinyl alcohol) (PVA) Solid Blend Polymer Electrolyte Membranes for Developing Primary Magnesium Ion Cells," was supervised by Dr Ismayil, Associate Professor in the Physics Department.



#### Mr Kiran R receives Best Oral Presentation Award

Mr Kiran R, research scholar from the Physics Department of MIT, Manipal, received the Best Oral Presentation Award at the conference Energy Harvesting Technologies: Tapping the Power of Nature held during 23- 24 July 2024 at St. Aloysius (Deemed to be University), Mangaluru. His work was guided by Dr Sudha D Kamath, Head of the Physics Department at MIT, Manipal.



#### Mr Madhu S receives Best Poster presentation Award

Mr Madhu S, research scholar from the Physics Department, received Best Poster presentation Award for his paper titled "Optimization of Sputtered Copper Nitride Thin Films for Thermoelectric Application" in the International Conference on Recent Trends in Energy Harvesting (ICRTEH-2024) organized in virtual mode by the Department of Physics at the Madanapalle Institute of Technology and Science, Andhra Pradesh held during 23-25 September 2024. His research work is guided by Dr Nagaraja KK and coguided by Dr Ashok Rao in the Department of Physics.



#### Gujjati Sathvik Completes SURGE 2024 Fellowship at IIT Kanpur

Mr Gujjati Sathvik, a final year BTech Mechanical Engineering student successfully completed the prestigious SURGE 2024 Fellowship Program at IIT Kanpur. This program offers top students from across the country the opportunity to engage in research projects at one of India's leading academic institutions. During his fellowship, Sathvik worked on a project titled "Numerical Investigation of Supersonic Combustion in Varying Geometrical Rotating Detonation Engines and Influence on Linear Aerospike Engines." This research, guided by Dr Ashoke De, Associate Dean of Academic Affairs and Air Force Chair Professor in the Department of Aerospace Engineering at IIT Kanpur, focused on advanced aerospace engineering concepts with significant applications in propulsion Systems.



#### Shambhavi and Arpit receive invitation to 'Digital Tech Summit'

Ms Shambhavi Sinha, a second-year BTech Computer Science student at MIT Manipal, and Arpit Kumar, a second-year BSc Physics student (DAMP, MAHE), have been invited to participate in the prestigious Digital Tech Summit in Copenhagen, under the Young Entrepreneurs track. The students who are the co-founders of the startup Navmarg Research and Innovation (P) Ltd, received full support for their travel from the event organizers. Navmarg Research, working closely with CSIR labs and the Bihar Government, is focused on implementing its patented technology for the removal of arsenic from potable water supplied to schools and colleges. It was among the top 3 startups selected by NASSCOM last year.



#### Nakshatra completes Basic Mountaineering Course at ABVIMAS

Ms Nakshatra Bhandary, a BTech Computer Science student at MIT Manipal, successfully completed the Basic Mountaineering Course at the Atal Bihari Vajpayee Institute of Mountaineering and Allied Sports (ABVIMAS), Manali, Himachal Pradesh. The 26-day course, held in the challenging terrain of the Himalayas, is designed to equip participants with fundamental mountaineering skills essential for high-altitude expeditions. During the course, Nakshatra learnt a range of techniques, including rock climbing, belaying, ice and snow craft, jumaring, and rappelling, as well as advanced skills like crevasse rescue and river crossing.





"

#### Team METAL Reaches Finals of 'Samsung Solve for Tomorrow 2024' Competition

A student team named Team METAL, involving Shambhavi Sinha (BTech CCE, MIT Manipal), Arpit Kumar (BSc Physics, MAHE), and Abhijeet Kumar (BSc CSDA, IIT Patna), have advanced to the Grand Finale of the Samsung Solve for Tomorrow 2024 competition, set to be held at IIT Delhi in the first week of October. As part of the competition, the team also participated in the Innovation Walk, visiting Samsung Research Institutes in Bangalore, Noida, Delhi, and Gurugram, where they gained valuable insights into the latest developments in technology and innovation. Team METAL is instrumental in setting up the startup Navmarg Research and Innovation Private Limited which focuses on water treatment technology designed to address arsenic contamination.





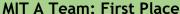


#### Niyati Kaur Completes Everest Base Camp Trek Nivati Kour, a student of Aeronautical Engineering, MIT, Manipal, successfully completed the challenging trek to the Everest Base Camp covering a height of 5364 meters.



#### MAHE INTER COLLEGIATE TABLE TENNIS (MEN) event on 29 September 2024







MIT B Team: Second Place

#### MAHE INTER COLLEGIATE CHESS event on 30 September 2024



MIT A Team: First Place



MIT B Team: Second Place



#### THUMP THUMP THUMP

My heart goes, what am I forgetting? What did I not do today? I look at the clock, 11:38pm. What happens at 11:38 pm? The day is almost done, it's time to scroll till I fall asleep, but I'm sweating, dread taking over me.



My mind races as I try to recall every task, every commitment, every responsibility.

Did I finish that project? Did I call Mom back? Did I take my meds? The thoughts swirl, a maddening vortex of uncertainty.

But then, a nagging voice in the back of my head whispers, "Something's off." It's a familiar feeling, one I've grown accustomed to ignoring. Yet, tonight, it's louder, more insistent. I try to shake off the feeling, telling myself I've got everything under control. But the voice persists, echoing in my mind like a mantra of doubt.

The thoughts linger, but I push them aside, focusing on the mindless scroll. It's nothing, I tell myself.

#### ТНИМР ТНИМР ТНИМР



This time it's my door.

A rather strong (a little too strong, if you ask me) knocking.

Suddenly, my eyes widen as realization dawns:

I forgot to punch in! My hostel room's sign-in system requires me to log my presence by 11:30 PM. If I don't, I'll face a hefty fine of Rs 100, maybe even a tighter curfew, considering I've missed it quite a few times.

I unlock my door, ready to face my doom. The caretaker asks, "Sowmya, Punch nahi kiya?" and my shoulders droop.



I set reminders, set reminders for everything, even the most obvious ones.



**Student Article Contributed by:**Sowmya G

3<sup>rd</sup> year, Integrated Msc in Math and Computing

# HIDDEN STRUGGLES OF COLLEGE

# **A Story of Growth & Belonging**

College has been my dream place ever since high school. I was keen on escaping the confinement of adolescence and reaching the free world of adults. I wanted to experience being responsible, try my resolve, live alone in a new city, and have sleepless nights with my friends. These thoughts were my sole motivation for the entrance exams.

When I first arrived in Manipal, I felt like my daydreams were turning into reality. I was going to live alone, in a new, beautiful city. Every face was new. From sleeping on a new bed to making new friends, it felt like I was building my life from scratch.

I had to leave my old family behind and make a new one here. A new family for four years. But to find that new family is the most difficult task. That was when reality brutally crashed onto me. While in my fantasy I was going on trips with friends, finding those friends was not effortless — one of the many downsides of adulthood.

One month passed like nothing and everyone around me seemed to be living my dreams. My pipe dreams did not show me the struggles of finding the right people. I met more than a dozen people every day but could never let myself lose around them. I was surrounded by so many people but still felt alone.

And after all this, I had to go back to my empty dorm room. There was this unsettling hollowness inside me. It was homesickness and it was the first time I ever experienced that. It was not just home that I was missing. It was the connection, the warmth, the security of home that I was missing. It was not being able to call someone mine I missed.

Amidst this was the academic pressure. Labs and classes every day. Mid-Sems, viva, internals. New, difficult concepts somehow always lost their way into my brain. Somehow the studying part was missing in my dreams.

This became another reality check. People do not talk about how much we have to study to achieve what we came here for. And it was tough to concentrate when I was lacking a part of myself. The part that I left at home. I felt my dreams crumbling.

I wasn't able to find that amazing life that would turn into nostalgia in four years, and I wondered if I was alone. I wasn't. I found that out later. We all just look around and assume everyone has what we do not. We never think that someone else might be suffering in the same way. We always assume that we are alone.

So, if everyone has a hard time making friends, why is college life so celebrated? Is everything a myth? Well, not everything. Sometime along the way, we all find our people. I did too. It may take time and come in a very unexpected way but when it does it lasts more than just four years.

It fills the hollowness inside you and heals you. The empty dorm starts feeling peaceful. It is not as whimsical as shown in the media. We still have too much to think about—like our future. But these are the things we will never want to forget. The stories that will be heard by our peers that come and go along the way.

Manipal will truly be unforgettable for me. Even though there were hurdles initially, it did become my second home.



Student Article Contributed by:

Udita Kumari
2<sup>nd</sup> year, CCE

### **ALUMNI MATTERS**



Ambika Sharma New Head of Al strategy at Google

Ms Ambika Sharma, an alumna of MIT Manipal (BTech in Electronics and Communication Engineering, Batch of 2013), has assumed the role of Head of AI Strategy at Google with effect from February 2024.



Ambar Atal Appointed Commercial Business Manager at Taylor & Francis Mr Ambar Atal (BTech in Industrial Production, Batch of 2005) is currently associated with Taylor and Francis, New Delhi as Commercial Business Manager. Prior to this Ambar was associated with Cambridge University Press & Assessment as Strategic Alliances Manager. He pursued MBA at Asian Institute of Management, New Delhi.

#### Siddhant Vora Receives Emerging CMO of the Year 2024 Award

Mr Siddhant Vora, an alumnus of MIT Manipal (BTech in Mechatronics, Batch of 2015) won the prestigious Emerging CMO of the Year 2024 award at the WOW Asia Awards in August 2024. The Marketing Industry of India nominated Mr Siddhant Vora for the most reputed marketing awards - WOW Asia Awards 2024. He won the award, as Marketing Lead of Greaves Electric Mobility (Ampere) for accelerating 2W and 3W EV Adoption across India, particularly his pan-India campaigns with Royal Challengers Bangalore and the 10,000 KM Kashmir to Kanyakumari roadshow.



#### **ALUMNI VISITS**

Mr Richeek Dey, alumnus of MIT, Manipal (Biomedical Engineering, Batch of 2014) visited MIT on 1 July 2024.

**Mr Sudeep Edakkattu**, Managing Director & NIS Country Leader at NIDEC INDUSTRIAL SOLUTIONS and alumnus of MIT, Manipal (Electrical and Electronics Engineering, Batch of 1994) visited MIT on 2 July 2024.

Ms Anisha S L, alumna of MIT, Manipal (Biomedical MTech, Batch of 2023) visited MIT on 10 July 2024.

Mr Prashanth Sharma, Technical Sales Manager at Grace Catalysts Technologies and alumnus of MIT, Manipal (Chemical Engineering, Batch of 1995) visited MIT on 10 July 2024.

Ms Samhitha Shivaprasad, Post Graduate Engineering Trainee at Innovolution Healthcare Private Ltd and alumna of MIT, Manipal (Biotechnology, Batch of 2024) visited MIT on 10 July 2024.

Mr Pradeep Sharma, Head of Business Development at National Buildings Construction Corporation and alumnus of MIT, Manipal (Civil Engineering, Batch of 1989) visited MIT on 13 July 2024.

Mr Dipt Chandra, Team Leader at MSV International INC and alumnus of MIT, Manipal (Civil Engineering, Batch of 1996) visited MIT on 16 July 2024.

Mr Dayashankar K Shetty, Director at M/s Windsor Refractories Ltd and alumnus of MIT, Manipal (Chemical Engineering, Batch of 1975) visited MIT on 16 July 2024.

Mr Tilak Hegde, Director at Fidelity Investments and alumnus of MIT, Manipal (Computer Science and Engineering, Batch of 2004) visited MIT on 19 July 2024.

Mr Rajesh Shenoy, Director-Life Sciences at Capgemini Invent, Hyderabad and alumnus of MIT, Manipal (Biomedical Engineering, Batch of 1996) visited MIT on 19 July 2024.

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**Mr Shivam**, author and coach, alumnus of MIT, Manipal (Aerospace Engineering, Batch of 2014) visited MIT on 26 July 2024.

Mr Pradeep Sinha, CEO at Inditech International and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1984) visited MIT on 26 July 2024.

**Dr Sanjay Bahl**, Director General at CERT-In, Meity, Government of India and alumnus of MIT, Manipal (Electrical and Electronics Engineering, Batch of 1984) visited MIT on 26 July 2024.

Mr Chethan M Sonawala, Managing Director at Prime4 Inspection LLC and alumnus of MIT, Manipal (Electronics and Communication Engineering, Batch of 1984) visited MIT on 26 July 2024.

Mr Mukesh Sanghvi, Managing Director at Indore Composite Pvt Ltd and alumnus of MIT, Manipal (Chemical Engineering, Batch of 1984) visited MIT on 26 July 2024.

Mr Ketan Salot, Managing Director at Vijay Fire Systems Pvt Ltd and alumnus of MIT, Manipal (Electrical and Electronics Engineering, Batch of 1984) visited MIT on 26 July 2024.

Mr Sanjay Ladhani, Director at Bulon Eng & Infrastructure Pvt Ltd and alumnus of MIT, Manipal (Civil Engineering, Batch of 1984) visited MIT on 26 July 2024.

**Mr Rajesh Shah**, Proprietor at CXO Consulting and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1984) visited MIT on 26 July 2024.

Mr Hitesh P Seth, Steel Distributor at Ratnadeep Steel Traders and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1984) visited MIT on 26 July 2024.

Mr Vishwanath Nayak, alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1980) visited MIT on 29 July 2024.

Mr Kini Shivanand Alevoor, PM at MDL, NPCC and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1980) visited MIT on 29 July 2024.

**Mr Ravi Chauhan**, Superintending Engineer (Retd.) at Irrigation Dept. Punjab and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1980) visited MIT on 29 July 2024.

Mr Ram Mohan Naik, Divisional Manager at United India Insurance Company Ltd. and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1980) visited MIT on 29 July 2024.

Mr Sujith Nivas Nireshwalya, Proprietor at Nivas Structurals and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1980) visited MIT on 29 July 2024.

Ms Tanushka Singh, FG Officer at IAF and alumna of MIT, Manipal (Electrical and Electronics Engineering, Batch of 2022) visited MIT on 2 August 2024.

Mr Rajgopal, Director at Edifice Constitutions and alumnus of MIT, Manipal (Computer Science and Engineering, Batch of 1993) visited MIT on 3 August 2024.

Mr Goldin B Furtado, associated with DP World and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2001) visited MIT on 3 August 2024.

Mr Mukesh Raghu Naik, associated with Al Hathboor Group (Dubai) and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2001) visited MIT on 3 August 2024.

Mr Ashok M Acharya, Managing Partner (Self-Employed) and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2001) visited MIT on 3 August 2024.

Mr Rajesh D'Souza, Managing Partner (Self-Employed) and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2001) visited MIT on 3 August 2024.

Mr Anand Shriyan, Managing Director (Self-Employed) and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2001) visited MIT on 3 August 2024.

**Mr Ashwin Shetty**, alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2001) visited MIT on 3 August 2024.

Mr Varun Khemani, Product Owner Head at Proximus and alumnus of MIT, Manipal (Electronics and Communication Engineering, Batch of 2005) visited MIT on 10 August 2024.

Mr Akhouri Anurag, Regional Manager at Nuvaco Vistas Corp. Ltd and alumnus of MIT, Manipal (Civil Engineering, Batch of 2015) visited MIT on 16 August 2024.

Mr Siddhartha Khandelwal, alumnus of MIT, Manipal (Civil Engineering, Batch of 2013) visited MIT on 16 August 2024.

Mr Bratindra Dutta, Project Director at Oracle and alumnus of MIT, Manipal (Electronics and Communication Engineering, Batch of 1993) visited MIT on 16 August 2024.

Mr V V Rajasekhar, Partner at Bridge Craft Eng. & Consultants and alumnus of MIT, Manipal (Civil Engineering, Batch of 2018) visited MIT on 20 August 2024.

Mr Srinath Shetty N, Director - Sales at Desmet India Pvt. Ltd. and alumnus of MIT, Manipal (Chemical Engineering, Batch of 1984) visited MIT on 21 August 2024.

Mr Suryadipto Sarkar, PhD Candidate at Fau Erlangen and alumnus of MIT, Manipal (Electronics and Communication Engineering, Batch of 2016) visited MIT on 22 August 2024.

**Mr Rishab Mahajan**, Senior Software Engineer at Cisco and alumnus of MIT, Manipal (Electronics and Communication Engineering, Batch of 2017) visited MIT on 23 August 2024.

**Ms Sushma**, Consultant at UN women and alumna of MIT, Manipal (Structural Engineering MTech, Batch of 2016) visited MIT on 31 August 2024.

Mr Sankalp Asthana, Software Engineer at Jupiter Networks and alumnus of MIT, Manipal (Information and Communication Technology, Batch of 2022) visited MIT on 31 August 2024.

Mr Nayam Prakash, alumnus of MIT, Manipal (Biomedical MTech, Batch of 2016) visited MIT on 31 August 2024.

Mr Arjun Shetty, HCM Digital Transformation Lead at TCS and alumnus of MIT, Manipal (Computer Science & Engineering, Batch of 2001) visited MIT on 31 August 2024.

Mr Neel Joshi, alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2019) visited MIT on 04 September 2024.

Ms Ambika Sharma, AI Head at Google, USA and alumna of MIT, Manipal (Electronics and Communication Engineering, Batch of 2013) visited MIT on 05 September 2024.

Mr Sri Nikhil Kondaveeti, Head of Construction & Investments at Navya Enterprise Pvt. Ltd. at Exelon Circuits Pvt. Ltd. and alumnus of MIT, Manipal (Civil Engineering, Batch of 2019) visited MIT on 05 September 2024.

Ms Madhavi Shenoy, alumna of MIT, Manipal (Electrical and Electronics Engineering, Batch of 2020) visited MIT on 10 September 2024.

**Mr Yashasavi Jaipriyar**, alumnus of MIT, Manipal (Electronics and Communication Engineering, Batch of 2014) visited MIT on 11 September 2024.

**Mr Naresh Kamath**, alumnus of MIT, Manipal (Electronics and Communication Engineering, Batch of 2016) visited MIT on 11 September 2024.

**Mr Siddharth Nambiar**, alumnus of MIT, Manipal (Aeronautical Engineering, Batch of 2018) visited MIT on 11 September 2024.

**Mr Aayush Sahni**, alumnus of MIT, Manipal (Civil Engineering, Batch of 2015) visited MIT on 11 September 2024.

Mr Abhay Maheshwari, alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2014) visited MIT on 11 September 2024.

Ms Anamika Gupta, Associate Scientist at Syngene and alumna of MIT, Manipal (Biotechnology, Batch of 2015) visited MIT on 13 September 2024.

Ms Vinitha Chelluboina, Junior Civil Engineer at Jacobs, Doha, Qatar and alumna of MIT, Manipal (Civil Engineering, Batch of 2021) visited MIT on 13 September 2024.

Mr Ayush Kedia, Vice President at HDFC Bank and alumnus of MIT, Manipal (Instrumentation & Control, Batch of 2006) visited MIT on 14 September 2024.

Mr Shakun Chauhan, Vice President at Yoptima media solutions and alumnus of MIT, Manipal (Electrical and Electronics Engineering, Batch of 2006) visited MIT on 14 September 2024.

Mr Alok Sharma, Head Consultant at Wipro and alumnus of MIT, Manipal (Instrumentation & Control, Batch of 2006) visited MIT on 14 September 2024.

Mr Abhay Sood, Transformation Program Manager at Mondelez and alumnus of MIT, Manipal (Instrumentation & Control, Batch of 2006) visited MIT on 14 September 2024.

Mr G Ramakrishna Rao, Deputy Director at Department of Industries of Andra Pradesh and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 1984) visited MIT on 24 September 2024.

**Mr Jithin Sunny**, Director at XEA Innovations and alumnus of MIT, Manipal (Electrical and Electronics Engineering, Batch of 2021), visited MIT on 07 October 2024.

Ms Shefali Chandra, VP-Data & Advanced Analytics Operations at Genpact and alumna of MIT, Manipal (Instrumentation and Control Engineering, Batch of 2010), visited MIT on 10 August 2024.

Mr Nitin Agarwal, Owner at MCG infrastructure ltd. and alumnus of MIT, Manipal (Instrumentation & Control, Batch of 2006) visited MIT on 14 September 2024.

Mr Pranav Kumar, Team Leader at LNM infra project Ltd. and alumnus of MIT, Manipal (Civil Engineering, Batch of 1995) visited MIT on 16 September 2024.

Mr Rohan Kumar, Assistant Manager at Maruthi Suzuki India Ltd. and alumnus of MIT, Manipal (Mechanical Engineering, Batch of 2023) visited MIT on 17 September 2024.

Mr Sumit Sahai, Director at Instep Adventures Ltd. UK and alumnus of MIT, Manipal (Computer Science and Engineering, Batch of 1994) visited MIT on 17 September 2024.

#### **APPRECIATION OF SERVICE**

MIT, Manipal recognizes the immense contribution of the following personalities who recently superannuated from service



**Dr Raviraja Adhikari**Professor
Dept of Mechanical & Industrial Engg

Date of Joining: 30 July 1987 Date of Superannuation: 31 July 2024



Dr Chandrashekhar Bhat
Professor
Dept of Mechatronics Engg

Date of Joining: 03 Aug 1987 Date of Superannuation: 31 July 2024



Dr B H Venkataram Pai Professor Dept of Civil Engg

Date of Joining: 30 Oct 1987
Date of Superannuation: 30 Sept 2024



Ms Cynthia Menezes
Senior Systems Executive
Dept of Computer Science & Engg

Date of Joining: 29 Aug 1991 Date of Superannuation: 31 July 2024



Mr Ganapathi Acharya Senior Technician (Machine Shop) Workshop

Date of Joining: 30 Sept 1991 Date of Superannuation: 31 July 2024



Mr Gokula Plumbing Assistant Maintenance

Date of Joining: 01 Dec 2023
Date of Superannuation: 31 Aug 2024



Mr Bhaskar C Senior House Keeping Staff Security

Date of Joining: 01 Nov 1983 Date of Superannuation: 31 Aug 2024



Ms Suneetha Bhandarthy
Senior House Keeping Staff
Security

Date of Joining: 09 June 1997 Date of Superannuation: 31 Aug 2024



Mr Sudhakar Acharya Foreman-Workshop Workshop

Date of Joining: 18 Aug 1988
Date of Superannuation: 31 Aug 2024



'A good teacher is like a candle - it consumes itself to light the way for others.'

This saying captures the spirit of Dr B H Venkataram Pai, a distinguished educator and revered mentor at MIT, MAHE. Known for his ability to break down complex ideas into simple, digestible insights, Dr B H V Pai has inspired countless students since he joined as a Lecturer in Civil Engineering in 1987. His unique teaching style, which combines deep subject knowledge, exceptional command of language with a sharp sense of humour, transformed his classroom into a lively arena of joyous learning.

Dr B H V Pai is celebrated for his rare gift of communication, backed by an extensive reading habit and a command of the subject that made his lectures both impactful and memorable. Students often recall his sessions as enlightening yet entertaining, a balance that has earned him the Best Teacher Award in 2012 and a reputation as one of MIT's most admired teachers among students.

Beyond teaching, Dr B H V Pai has contributed significantly to MIT's research and academic growth. His research work on specialized concretes, including self-compacting and self-curing varieties, led to a funded project by the Department of Atomic Energy. As the Joint Director of MIT, Manipal from 2015 to 2021, Dr Pai played a crucial role in steering the institution's initiatives and operational excellence.

Dr Pai's influence also extends to mentoring his peers. As a speaker in faculty induction programs on classroom management and soft skills, he has inspired new generations of educators to follow his path of clarity, humour, and dedication. His legacy at MIT, MAHE, is one of intellectual depth, compassion, and a lifelong commitment to lighting the way for others.

Above all, as the Chief Editor of FOCUS, newsletter of MIT, Manipal, Dr B H V Pai has exemplified the true essence of responsibility, carrying out his role with integrity and a vision that has enriched us all.

At this juncture of his superannuation after serving a long stint of 37 years of service, we salute our Chief Editor, as he steps forward into the next chapter of his journey.



#### **VISION**

Excellence in Technical Education through Research, Innovation and Teamwork.

#### **MISSION**

Educate students professionally to face societal challenges by providing a healthy learning environment grounded well in the principles of Engineering, Research, and Teamwork.

#### **VALUES**

Discipline
Integrity and Trust
Holistic Learning
Ethics and Professionalism
Concern for Society and Environment

#### **GOAL**

To be a world class technical institution fostering innovation, leadership and entrepreneurial spirit.



FILUS MIT NEWSLETTER, SEPTEMBER 2024 EDITION

#### **PUBLISHED BY**

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#### Distinguished Alumni Guests - MIT Pravesh 2024: BTech Orientation

Ms Rakhee A Chachra Global SG Business Strategist, IBM, Gurgaon

[ ECE 1992-96 ]





Mr Sandeep Dutta Senior Managing Lead, Accenture, Greater Delhi

[ EEE 1989-93 ]

Mr Madhav Nair Country Head & CEO India, Bank of Bahrain & Kuwait, Mumbai

[ EEE 1989-93 ]





Ms Veena Shenoy
Deputy General Manager - Strength,
Stiffness & Durability CAE Stimulations,
Mercedes Benz India R&D, Bengaluru

[ CIVIL 1993-97 ]

