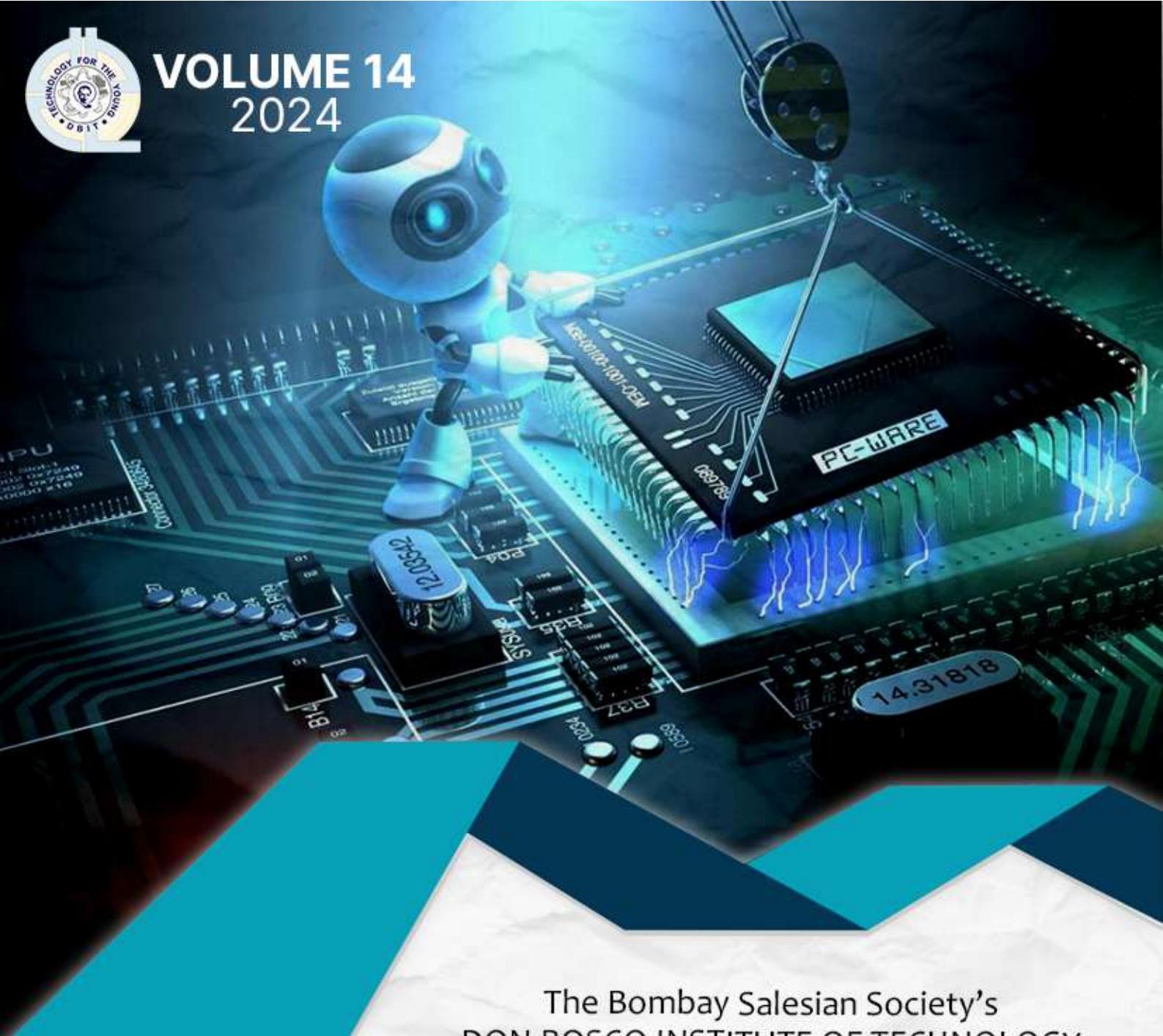




VOLUME 14
2024



The Bombay Salesian Society's
DON BOSCO INSTITUTE OF TECHNOLOGY

DBIT - EXTC SPECTRUM

WHAT'S INSIDE ?



STUDENTS' ACADEMIC
ACHIEVEMENTS



FACULTY CONTRIBUTION
& ACHIEVEMENTS

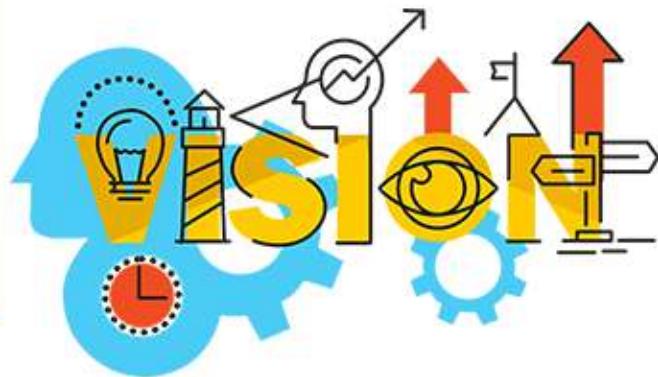


ACTIVITIES ORGANIZED
BY DEPARTMENT

Our Patrons



DEPARTMENT OF ELECTRONICS & TELECOMMUNICATION ENGINEERING



DBIT VISION

The Don Bosco Institute of Technology (DBIT) will be known to have an innovative, enjoyable and holistic learning environment that transforms individuals into socially conscious citizens the Don Bosco Way, and will lead in research and entrepreneurship in the area of sustainable technologies.

DEPARTMENT VISION

Department of Electronics and Telecommunication Engineering envisions technical professionals with principles of Don Bosco contributing to research, technology, society and sustainable development.

DEPARTMENT MISSION



- To produce technically competent, employable and socially responsible graduates with professional ethics.
- To facilitate creativity, research, innovation, teamwork and entrepreneur skills to meet academic, industrial and societal needs.

DBIT MISSION

- To create future engineers who work with honesty and integrity and excel in the use of technology for the benefit of the underprivileged.
- To train engineers to be innovative problem solvers and entrepreneurs who engage in research and life-long learning.
- To provide a diverse and stimulating environment for staff and students to grow holistically.

FROM THE PRINCIPAL'S DESK

It is with great pleasure that I extend my warmest greetings through this newsletter, showcasing the remarkable achievements within our Electronics and Telecommunications Department at Don Bosco Institute of Technology, Mumbai.

At DBIT, we take immense pride in our commitment to academic excellence and holistic development.

Our esteemed faculty members, with their deep expertise and unwavering dedication, play a pivotal role in shaping the educational experience at DBIT. They not only impart knowledge but also mentor our students, preparing them to excel in their fields and make meaningful contributions to society.

We are proud of our state-of-the-art laboratories and facilities that provide our students with hands-on learning experiences and prepare them for the challenges of the ever-evolving technological landscape.

Beyond academics, DBIT encourages a vibrant campus life enriched with cultural, technical, and sports activities. I appreciate the faculty for nurturing teamwork, leadership skills, and a sense of community among our students, preparing them for life.

As we look ahead, let us continue to uphold the values of excellence, integrity, and innovation that define DBIT. Together, we strive to push the boundaries of knowledge and contribute meaningfully to advancements in Electronics and Telecommunications.

Congratulations to Mrs. Namita Agarwal, HOD, and Faculty of the EXTC department for their commitment and outstanding work. Thank you to the Editor, Mrs. Pratibha Dumane for making this edition of the newsletter a reflection of the department's achievements and aspirations yet again.



**Warm Regards,
Dr. Sudhakar Mande**

FROM THE HOD'S DESK

Greetings of the Day!

As we conclude another dynamic and productive year, I am thrilled to share the latest edition of 'Spectrum' our department newsletter comprising achievements, activities, and events that have marked a period of remarkable progress and success for our department.

Our students have once again proven their mettle in various domains. Congratulations to all the participants who won inter and intra-collegiate events in both co-curricular and extracurricular activities.

Recognizing the evolving learning landscape, we understand that students learn from various sources leading them to peer and experiential learning. A plethora of activities including industrial visits, field trips, educational tours, seminars, and workshops were organized to engage the students to broaden their horizons, deepen their understanding, and enhance their personal and professional growth.

Our department has strengthened its engagement with both the industry and community partners. Industry Collaborations have provided our students with an opportunity to work on real-time projects along with invaluable internship and employment opportunities, further bridging the gap between academia and industry. Additionally, through outreach programs, we are making a positive impact on society.

In conclusion, I extend my deepest gratitude to our faculty, staff, students, alumni, and industry partners for their unwavering support and dedication. It is through your collective efforts that we continue to thrive and make significant strides in our field. Thank you for being an integral part of our community. Together, we will continue to achieve great things!!

I want to express my heartfelt gratitude to Mrs. Pratibha Dumane for her exceptional work as our newsletter editor. Her dedication, attention to detail, and unwavering commitment have been instrumental in creating a publication that truly represents the spirit and achievements of our department.



Mrs. Namita Agarwal

FROM THE EDITOR'S DESK

I am very happy to present to you the 14th edition of our department newsletter, DBIT-EXTS-Spectrum.

We extend our heartfelt gratitude to the Management of DBIT, and Dr. Sudhakar Mande, Principal – DBIT, for their unwavering support and guidance.



The year gone by, yet again, has been a testament to our collective dedication to the Vision and Mission of Don Bosco Institute of Technology.

As we strive for excellence, we celebrate the myriad accomplishments and milestones, moments of triumph and joy, which are a testament to the unwavering commitment and team work of our faculty and students. This newsletter is not only a celebration of our achievements but also a platform to recognize and honour the contributions of all involved.

Creating this edition has involved countless hours of dedication to capture the vibrant spirit of our department.

We extend our heartfelt gratitude to Mr. Immanuel Machado for his exceptional support and dedication in making this edition possible.

As you delve into this edition, we hope you appreciate the spectrum of achievements and memorable moments that have defined yet another remarkable year.

Happy Reading!

Ms. Pratibha Dumane

STUDENTS ACADEMIC ACHIEVEMENTS (2022-23)

S.E. EXTC Semester III

RANK	NAME OF STUDENT
1	Ansari Mohd Raza Abdul Qayyum Firdous Bano
2	Rai Diya Naveen Suguna
3	Tiwari Palak Umesh Neelam

S.E. EXTC Semester IV

RANK	NAME OF STUDENT
1	Tiwari Palak Umesh Neelam
2	Rai Diya Naveen Suguna
3	Ansari Mohd Raza Abdul Qayyum Firdous Bano

T.E. EXTC Semester V

RANK	NAME OF STUDENT
1	Kaveri Sakshi Vadiraj
2	Khantwal Rakshita Rajeev
3	Benish Christo Louis

T.E. EXTC Semester VI

RANK	NAME OF STUDENT
1	Rao Adarsh Jaishankar
2	Lovely Varshney Chanchal
3	Khantwal Rakshita Rajeev



ACADEMIC ADVISORY COMMITTEE (AAC) MEETING

The Academic Advisory Council meeting was organised on 09 September 2023. The committee members included Dr. Milind Shah, Professor & Head (EXTC), Fr. C. Rodrigues Institute of Technology, Navi Mumbai, Mr. Sunil Dulange, JNPT, Mr. Hansel Crasto, DBIT EXTC Alumni. It brought together key stakeholders to discuss critical academic matters and challenges and the way forward for ensuring excellence in education. The meeting was a productive exchange of ideas and recommendations that will play a pivotal role in planning various events and activities for the students.

PARENTS-TEACHERS' MEETING

The Parents-Teachers meetings were convened on 9 September 2023 and 24 February 2024. The purpose of the meetings was to establish a dialogue between the faculty and the parents/guardians of the students to discuss academic progress, address concerns, and foster collaboration for the holistic development of the students.



Ms. Namita Agarwal, HOD addressing the parents and students

Dr. Sudhakar Mande, Principal DBIT, addressed the parents and reinforced the commitment of all teachers for nurturing the holistic development of the students and the importance of the support of the parents.

The Head of Department, Ms. Namita Agarwal stressed upon the need for the parents to actively participate in the student's academic journey.



SYNCHRONY 2024 ALUMNI MEET



SYNCHRONY 2024 was organised on 10 February 2024 by DBIT with enthusiastic participation from alumni and students. A total of 39 EXTC alumni attended the event.



JOURNAL PAPERS

- Ibadi, H., Mande, S. S., & Rizvi, I. (2023) "Design of Scalability Enabled Low Cost Automatic Speaker Recognition System Using Light Weight Multistage Classifier", IETE Journal of Research, 1–15. <https://doi.org/10.1080/03772063.2023.2252386>

- Satishkumar Chavan, Leetaa Nair, Nishikant Nimbalkar, and Sarah Solkar, "Karyotyping of Human Chromosomes in Metaphase Images using Faster RCNN and Inception Models," International Journal of Imaging Systems and Technology, Wiley Publication, 2024. DOI: 10.1002/ima.23041, Web of Science and Scopus (Accepted).

- Siddhant Kedar, Pranjali Raval, Amogh Worlikar, Sarika Galphade, Satish Chavan, Pratibha Dumane, "Evaluating the Effectiveness of Machine Learning Models for Early Diagnosis of Chronic Kidney Disease" in The Indian Journal of Technical Education, Volume 47, Special Issue No. 1, February 2024.

- Madhavi S. Pednekar, Kaustubh Bhattacharyya, B.K.Lande, "Automatic Identification of Malvani Dialects from Audio Signal Based on Hybrid FFO-TSO with Deep Neural Network", An International Journal of Multimedia Tools and Applications, 2024 Springer (Accepted).



CONFERENCE PAPERS

- P. C. Mule, Sudhakar Mande, "Design and Performance Analysis of FPGA based DPU using MAC Unit," 2023 IEEE 8th International Conference for Convergence in Technology (I2CT), Lonavla, India, 2023, pp. 1-6, doi: 10.1109/I2CT57861.2023.10126363.
- Sunantha Guruswamy, Bobby Sharma, Nilesh Sable, Chirag Nooh Kurane, Satishkumar Chavan, "A System for Feature Extraction and Classification of Ovarian CT Radiology Reports," IEEE 6th International Conference on Advances in Science and Technology (ICAST 2023), Mumbai, 08-09 December, 2023.
- Shubhangi Katariyar, Pradnya Tendolkar, Satishkumar Chavan, Sunantha Krishnan, Shubham Shinde, Nilesh Sable, "Survival Prediction in Renal Cell Carcinoma Patients using Machine Learning," IEEE 6th International Conference on Advances in Science and Technology (ICAST 2023), Mumbai, 08-09 December, 2023.
- Abhishek Tripathi, Shafaque Shaikh, Elton Noronha, Sagar Kote, Satishkumar Chavan, Pratibha Dumane, "Sustainable Development Assessment of South Asian Countries Using Fuzzy Logic," Proceedings of the 4th International Conference on Advanced Technologies for Societal Applications - Volume 1 (Techno-Societal 2022), Springer, Cham, Chapter 29, pp. 261-269, September 2023, ISBN 978-3-031-34643-9.
DOI: https://doi.org/10.1007/978-3-031-34644-6_29.
- Anuj Dhumal, Shivam Sharma, Vivek Kamble, Namita Agarwal presented a paper titled "Design of Web Based Student Information System" at the National Level Student Conference IEEE TECHNICOKNOCKDOWN-2024 organised by Sinhgad Institute of Technology, Lonavala on 20 April 2024.
- Aparna Telgote, Sudhakar Mande presented a paper on "Implementation and Analysis of MAC Layer and Network Layer Protocols in 6LoWPAN Networks for Home Automation: A Comparative Study of Software and Hardware Approaches" at the 15th International IEEE Conference on Computing, Communication and Networking Technologies (ICCCNT) on June 24, 2024, organised by IIT- Mandi, Himachal Pradesh, India.

CONFERENCE PAPERS

- Priya Mule, Sudhakar Mande presented a paper on “12 Stage FFT Implementation using Cordic based Pipeline SFD Architecture ” at The 15th International IEEE Conference on Computing, Communication and Networking Technologies (ICCCNT) on June 24, 2024, organised by IIT- Mandi, Himachal Pradesh, India.



FACULTY RECOGNITION / ENGAGEMENTS

- Dr. Sudhakar Mande has been appointed as a Member of the Board of Studies (Electronics & Telecommunications Engg.) in the University of Mumbai.
- Dr. Sudhakar Mande has been appointed as a Member of the IETE-ISF Organisational Members Committee (IOMC).
- Dr. Sudhakar Mande is a Member on the Academic Advisory Council of the following colleges:
 - Shah & Anchor Kutchhi Engineering College
 - D.J. Sanghvi College of Engineering
 - Sardar Patel Institute of Technology
 - Vivekanand Education Society's Institute of Technology
- Dr. Ashwini Kotrashetti was invited as a panel member to interview candidates for the post of Research Scientist (Electronics) on 06 July 2023 and Scientist- B on 01 & 15 September 2023.



- Dr. Ashwini Kotrashetti has been the program coordinator for the “Engineering Futures- CrEAST” program funded by L&T CSR Department since July 2021.
- Dr. Ashwini Kotrashetti and Ms. Freda Carvalho provided consultancy for network speed testing to Quectel- Global IoT Solutions Provider, Mumbai on 31 July 2023 and 01 August 2023.
- Dr. Ashwini Kotrashetti has been contributing as a reviewer for the IEEE Transactions on Microwave Theory and Techniques since 2022.
- Ms. Poonam Chakraborty was invited as a judge in the Hindi Shayari Competition and Recitation Competition held during Hysteria 2024 at DBIT.

- Dr. Ashwini Kotrashetti contributed as a reviewer in the following conferences:
 - 2023 Asia-Pacific Microwave Conference (APMC 2023), Taiwan.
 - 2023 IEEE International Symposium On Antennas And Propagation (ISAP2023), Malaysia.
- Dr. Satishkumar Chavan served as a Session Chair at the 6th IEEE International Conference on Advances in Science and Technology (ICAST2023) hosted by K. J. Somaiya Institute of Engineering and Information Technology in Mumbai on 08-09 December 2023.
- Dr. Satishkumar Chavan contributed as a Reviewer for the 6th International Conference on Emerging Technologies in Digital Transformation and Aligned Education (PuneCon2023), organised by IEEE Pune Section and COEP Technological University, Pune during 15-16 December 2023.
- Ms. Pratibha Dumane contributed as a Reviewer in the following Conferences:
 - 6th International Conference on Emerging Technologies in Digital Transformation and Aligned Education (PuneCon2023), organised by IEEE Pune Section and COEP Technological University, Pune during 15-16 December 2023.
 - 4th IEEE International Conference on Computing, Communication, and Intelligent Systems (Sponsored by IEEE IAS) organised by Sharda School of Engineering and Technology, Sharda University, Greater Noida, Uttar Pradesh, India, during 03-04 November 2023.
 - Springer International Conference on Recent Developments in Cyber Security (ReDCySec-2024) organised by Center for Cyber Security and Cryptology, Sharda University on 30-31 May 2024.
 - International Conference On Generative AI, Cryptography And Predictive Analytics (ICGCPA 2024) organised by Dept. of Computer Science, School of Engineering & Technology, Vivekanand Institute of Professional Studies- TC, New Delhi on 28-29 June 2024.
 - Third International Conference on Smart Technologies and Systems for Next Generation Computing (ICSTSN 2024) organised by Indo French Educational Trust's College of Engineering, Tamil Nadu.
- Ms. Madhavi Pednekar was a member of the syllabus drafting committee in the Department of EXTC/ETRX, Vivekanand Education Society's Institute of Technology, Chembur, and K. J. Somaiya Institute of Engineering and Information Technology, Sion, Mumbai, both autonomous institutes affiliated to University of Mumbai for AY 2023-24.



Congratulations !!

The Department is proud of Dr. Sudhakar Mande, Professor (EXTC) who has been appointed as the new Principal of DBIT.

His appointment marks a significant milestone for our institution, and we extend our warmest congratulations to Dr. Mande on this achievement. We look forward to the continued success and growth of DBIT under his guidance.



Congratulations !!



Mr. UJWAL NIKAM FELICITATING Dr. SUDHAKAR MANDE



INVITED TALKS / WORKSHOPS BY FACULTY MEMBERS



- Dr. Sudhakar Mande delivered the following talks:
 - "Machine Learning in Mixed-Signal Design" in the AICTE Sponsored ATAL Faculty Development Programme organised by Fr. Conceicao Rodrigues College of Engineering, Bandra, Mumbai, on 04 December 2023.
 - "Outcome Based Education" at Don Bosco College, Kurla, on 19 April 2024.

- Dr. Satishkumar Chavan delivered the following talks:
 - "Biomedical Image Processing Applications in Healthcare," in ISTE Approved One Week Online Faculty Development Program on AI Algorithms and Applications in Healthcare organised by Finolex Academy of Management & Technology, Ratnagiri on 22 June 2023.
 - "Applications of DSP in the Medical Field" at SVERI's College of Engineering, Pandharpur, Dist. Solapur on 11 September 2023.
 - "Applications of Feature Engineering" for the TE students of Electronics and Telecommunication Engineering at SVERI's College of Engineering, Pandharpur, Dist. Solapur on 14 October 2023.
 - "Intellectual Property Rights (IPR) and Patenting" for Third Year Students of Computer Science & Engineering at SVERI's College of Engineering, Pandharpur, Dist. Solapur on 15 October 2023.
 - "Underwater Image Enhancement using Deep Learning," in AICTE ATAL one week FDP on Recent Trends in Underwater Signal, Image and Video Processing at Ramrao Adik Institute of Technology, D.Y. Patil Deemed to be University, Nerul, Navi Mumbai on 05 December 2023.

- Ms. Pratibha Dumane delivered the following talks:
 - "Project Prowess: Enhancing Your Impact through Personal Grooming and Presentation Skills" for the B.E.- IT students on 13 July 2023.
 - "Art of Impactful Presentations" for B.E.- EXTC students on 01 August 2023.
 - "Logical Thinking and Problem-Solving" for B.E.- EXTC students on 06 October 2023.

- Ms. Namita Agarwal delivered the following talks:
 - “Benchmarks and SoPs for NAAC- Criteria 7” during the Faculty Development Programme at DBIT on 26 August 2023.
 - “Scope in Electronics and Telecommunication Engineering” for FE students and their parents during the Orientation Programme on 02 September 2023 at DBIT.
 - “How to Improve Students' Attendance and Engage them Effectively for a Better Outcome” during the Faculty Development Programme at DBIT on 16 March 2024.
- Ms. Aparna Telgote delivered a talk on “Benchmarks and SOPs for NAAC- Criteria 3” during the Faculty Development Programme at DBIT on 26 August 2023.
- Ms. Freda Carvalho conducted a 15 hour hands-on course “meraApp” based on Mobile App Development under the Engineering Futures- CrEAST program funded by CSR Department of L&T in July-August 2023 and 11-15 December 2023.
- Dr. Ashwini Kotrashetti conducted a 15 hour hands-on course “meriUrja” based on Practical Applications of Solar PV Systems under the Engineering Futures- CrEAST program funded by CSR Department of L&T, from 11- 15 December 2023.
- Mr. Deepak Khake, Lab Assistant (EXTC) conducted a hands-on session for three days from 15-17 December 2023 on “Mobile Repairing” for the ITI students at Don Bosco, Walwanda.



- Ms. Pratibha Dumane was invited to conduct a Workshop on Yoga on 21 June 2024, The International Yoga Day, for the students and staff of Don Bosco Industrial Training Institute, Mumbai.
- Ms. Pratibha Dumane was invited by the NSS Unit of DBIT to conduct a Yoga Workshop on International Yoga Day 2024.

STUDENT CO-CURRICULAR AND EXTRA CURRICULAR ACTIVITIES

- Kshitija Zodge (TE) participated in the online course on “Overview of Remote Sensing Technology” conducted by ISRO under Shiksha Gagan Programme in June 2023.
- Kshitija Zodge (TE) attended the 12 hour online WGCapD Webinar Series on “Geoprocessing using Python” conducted by Indian Institute of Remote Sensing (IIRS), ISRO from 17- 28 July 2023.
- Rutvik Patil (TE), Premkumar Singh (TE) and Suhani Sawant (TE) secured the 4th prize in the 2023 R10 Robotics Competition Stage 1 organised by IEEE Bombay Section’s Student Activities Committee at Vidyalankar Institute of Technology, Mumbai on 02 August 2023.
- Shafik Shaikh (TE), Girish Sangare (TE), Faiz Chougule (TE) secured 2nd position in the Water Rocket Competition organised by IEEE-AESS VIT in collaboration with IEEE-AESS SPIT on 14 October 2023.
- Aryan Anand Arde (SE), Gavin Sunil Lobo (SE), Zubia Nisar Sarang (SE), Kartik Dileepkumar Danelia (SE) secured the 3rd position in the Water Rocket Competition organised by IEEE-AESS VIT in collaboration with IEEE-AESS SPIT on 14 October 2023.
- Annanya Zadbuke (TE), Khushi Shetty (TE) received a certificate for active participation in IB-SYWLC’23.
- Nimesh Ambre (BE), Raveena Pitale (BE), Prajeet Rao (BE) participated in 18th Aavishkar - Inter Collegiate /Institute/ Department Research Convention (Zonal Round) organised by the University of Mumbai at Vivekanand Education Society's Institute of Technology, Mumbai on 15 December 2023.
- Priyanshukumar Singh (SE) completed the online Professional Certificate Google Cybersecurity Course consisting of eight courses, developed by Google in January 2024.

- Aakash Belgaonkar undertook the following online certificate courses authorised by Google and offered through Coursera:
 - Foundations of Cybersecurity
 - Play it Safe: Manage Security Risks
 - Connect and Protect: Networks and Network Security
 - Tools of the Trade: Linux and SQL
 - Sound the Alarm: Detection & Response
 - Assets Threats & Vulnerabilities
 - Put it to Work: Prepare for Cybersecurity Jobs
 - Automate Cybersecurity Task with Python
 - Google AI essentials through Coursera

- Siddhant Kedar (BE), Pranjali Raval (BE), Amogh Worlikar (BE), Sarika Galphade (BE) participated in “Industry Innovation Meet (West Zone)- Project Exhibition” jointly organised by IETE Navi Mumbai and Mumbai Center on 17 February 2024 at Ramrao Adik Institute of Technology, Navi Mumbai.

- Nimesh Ambre (BE), Raveena Pitale (BE) and Prajeet Rao (BE) were one of the top 9 selected teams of a total of 27 teams for the preliminary round held on 18 February 2024 of YESIST’12 2024, organised by IEEE and IEEE AEES Student branch chapter of Sardar Patel Institute of Technology, Mumbai.

- Rutvik Patil (TE), Dibyarupa Pradhan (TE), Aditya Jadhav (TE), Mohd. Raza Ansari (TE), Shafik Shaikh (TE), Girish Sangare (TE), participated in the 11th Go Kart Design Challenge held in Coimbatore between 16-19 February 2024, also represented Xanthium Racing team of DBIT under EV category and Premkumar Singh (TE) & Mayuri Kadam (TE) represented DBIT's Xanthium racing team in the CV category.

- Anup Chiplunkar (TE) received a Certificate of Achievement for developing the game “Flying Voyage” from October 2023 to February 2024

- Ann Vincent Chittilappilly (TE) completed the online certificate course on “Put It to Work: Prepare for Cybersecurity Jobs”, certified by Google and offered by Coursera (5 May 2024).



STUDENTS ACHIEVEMENTS IN HYSTERIA' 23 - THE ANNUAL CULTURAL AND SPORTS FESTIVAL



- Annanya Zadbuke (TE) secured the First Prize in Regional Dance Competition
- Harsh Dusane (SE) secured the Third Place in Elocution Competition

GUEST LECTURES

SR. NO.	TOPIC	RESOURCE PERSON	ORGANISATION	DATE
1	Aspects of Urban & Rural Development	Mr. Mackency Dabre	Social Activist	02-Sep-23
2	Markov Processes	Dr. Revathy S.	BSH Dept., Don Bosco Institute of Technology	01-Oct-23
3	Role of Digital Systems in AI/ML	Dr. Sudhakar Mande	Principal, Don Bosco Institute of Technology	04-Oct-23
4	Insights of MOSFETs & Applications	Ms. Lakshmi S.	Research Scholar, IIT Bombay	12-Oct-23
5	Network Automation & Role of Automation in SDN Era	Mr. Yogesh Hudale	Telenetworks Technologies Ltd., Navi Mumbai	14-Oct-23
6	DBMS: ERD Approach & Insights	Ms. Sana Shaikh	Dept. of Computer Engg., DBIT	07-Feb-24
7	RDBMS: An Industrial Approach	Mr. Kundan Khanolkar	Executive Director, JP Morgan Chase, Mumbai	08-Feb-24
8	Machine Learning & Model Evaluation	Dr. Satishkumar Varma	Professor & Head of the Dept. (IT), Pillai College Of Engineering, New Panvel	01-Apr-24

Congratulations !!

Ms. Pratibha Dumane has been elected as the Member of the Executive Committee of the IETE Mumbai Centre for 2024-26.



INDUSTRIAL VISITS AND WORKSHOPS ORGANIZED FOR STUDENTS

- Dr. Ashwini Kotrashetti, Ms. Freda Carvalho with some final year students visited Reliance Jio, Mumbai on 31 July 2023 and 01 August 2023 for a testing assignment.



- A workshop on “Fibre Fusion Splicing and OTDR” by Mr. Nilesh Nikam and team from Aditya Infonet, Mumbai was organised by Ms. Poonam Chakraborty on 18 March 2024 for the BE students.



- An industrial visit to Jawaharlal Nehru Port Trust was organised on 19 March 2024 for the SE and TE students. 31 students participated in the visit along with faculty members Ms. Namita Agarwal, Ms. Pratibha Dumane and Mr. Deepak Khake.



- An industrial visit to BSNL, Satellite Earth Station at Yeoor, Thane was organised on 22 March 2024 for the students of BE EXTC. 42 students along with faculty members Ms. Poonam Chakraborty, Ms. Madhavi Pednekar attended this visit organised by Ms. Aparna Telgote.

ALUMNI INTERACTIONS

- Mr. Hansel D'Silva (Alumnus 2013 Batch) conducted a session on "Balancing Identity and Ambition" for the students on 09 October 2023.
- Alumni are also invited as experts / examiners for the final year Major Project exhibition and competition.



INNOQUEST 2023 - MINI PROJECT EXHIBITION AND COMPETITION

InnoQuest-2023 served as a platform for the students to showcase their project work, fostering open ended discussions on 03 November 2023. It also inspired the first year students to explore problem solving and application of the concepts they are currently learning. A total 18 projects of SE and 14 Projects of TE were exhibited during InnoQuest 2023.

WINNERS FROM S.E.

RANK	TITLE OF THE PROJECT	TEAM MEMBERS
I	Emergency Response Beacon	Prathamesh Kurudekar, Yashi Nimji, Nisha Singh, Akash Belgaonkar
II	Solar Mobile Charger	Aftab Shaikh, Noman Chaudhari, Shaunak Patil, Shahid Shaikh
III	Insect Repellent	Narayan Dalvi, Aditya Dabhade, Purva Dalvi, Abhishek Dubey
Consolation	Water Quality Monitoring System	Jero Royston, Poobalarayan Arpita Pawar, Samruddhi Patil

WINNERS FROM T.E.

RANK	TITLE OF THE PROJECT	TEAM MEMBERS
I	Cleaning Bot	Dibyarupa Pradhan, Rutvik K Patil, Premkumar Singh, Mayur Sonar
II	Digital Frequency Meter	Diya Rai, Vignesh Pai, Kshitija Zodge, Annany Zadbuke
III	BLE Notice Board	Girish Sangare, Ann Vincent, Shafik Shaikh, Suraj Golambade
Consolation	Audio Transmitter using LoRa	Palak Tiwari, Kirti Teli, Raza Ansari, Aditya Jhadav



ARDUINO AND FPGA BASED MINI - PROJECT EXHIBITION & COMPETITION

The department hosted a Mini Project Exhibition on 06 May 2024. The exhibition featured a total of 28 projects done by SE and TE students. Each project demonstrated practical applications of Arduino technology across various domains, reflecting the department's commitment to fostering innovation and excellence in engineering education. The event provided an invaluable opportunity for students to present their work, receive feedback from the judges, and inspire fellow peers with their creative solutions.



RANK	TITLE OF THE PROJECT	TEAM MEMBERS
I	Safety Link : A Medical Emergency Band	Prathamesh Kurudekar, Yashi Nimje, Nisha Singh
II	Smart Drill	Aditya Shetty, Priyanshu Singh, Neel Pujari, Samruddhi Patil
III	Water Quality Monitoring System	Aftab Shaikh, Jero Royston Poobalarayan, Arpita Pawar, Umair Shaikh

INTERNSHIPS

SR.NO.	NAME OF STUDENT	ORGANISATION
1	Annanya Zadbuke	Bharat Intern (Virtual Internship)
2	Hasan Ali Dalal	
3	Lovely Varshney	
4	Gouresh Sankhe	Theta Control Pvt. Ltd.
5	Adarsh Rao	
6	Gouresh Sankhe	
7	Lovely Varshney	
8	Shivam Sharma	
9	Russel Joachim D'mello	
10	Needhi Vijay Kamble	Selec Control Pvt. Ltd.
11	Shreeya Pimple	
12	Simran Kot	
13	Adarsh Rao	
14	Abhishek Waghmare	
15	Adarsh Rao	Engineering Furures - CrEast Program DBIT
16	Lovely Varshney	
17	Disha Maggu	Orex Coliving Spaces Pvt. Ltd.
18	Umer Rafique Shaikh	
19	Shruti Gokhale	
20	Deep Patel	
21	Adarsh Rao	
22	Lovely Varshney	
23	Gouresh Sankhe	
24	Benish Christo Louis	
25	Needhi Vijay Kamble	
26	Jaipreet Singh Saini	
27	Dibyarupa Pradhan	
28	Premkumar Pradip Singh	
29	Russel Joachim D'mello	
30	Annanya Zadbuke	
31	Aditya Saju Moozahil	
32	Dibyarupa Pradhan	
33	Girish Sangare	
34	Zubia Sarang	
35	Yash Garje	
36	Zubia Sarang	natureSense course under Engineering Futures - CrEAST Program funded by CSR Department, L&T
37	Raza Mohd Ansari	
38	Pooja Kadam	
39	Diya Rai	
40	Khushi Shetty	
41	Annanya Zadbuke	meriUrja course under Engineering Futures - CrEAST Program funded by CSR Department, L&T
42	Himanshu Jogi	
43	Suhani Sawant	
44	Mayuri Kadam	Let's Bot It course under Engineering Futures - CrEAST Program funded by CSR Department, L&T

INTERNSHIP



SR. NO.	NAME OF STUDENT	ORGANISATION
45	Prem Kumar Singh	
46	Aditya Jadhav	Let's Bot It - 2 course under Engineering Futures - CrEAST Program funded by CSR Department, L&T
47	Rutvik Patil	
48	Mohd. Daniyaal	
49	Manasi Dhotre	Make3D course under Engineering Futures - CrEAST Program funded by CSR Department, L&T
50	Rohit Mali	
51	Sanjeet Prajapati	Let's C IT course under Engineering Futures - CrEAST Program funded by CSR Department, L&T
52	Aditya Shetty	
53	Raj Mohite	
54	Narayan Dalvi	
55	Kartik Dandelia	Mera App course under Engineering Futures - CrEAST Program funded by CSR Department, L&T
56	Faiz Chougule	
57	Prerana Gawale	
58	Shafik Shaikh	
59	Sakshi Shidruk	Don Bosco Institute of Technology

PLACEMENT

SR. NO.	NAME OF STUDENT	ORGANISATION
1	Amogh Worlikar	Arcon IT Services and IT Consulting
2	Benish Christo	Mastek Ltd.
3	Adarsh Rao	Nucsoft Ltd.
4	Gouresh Sankhe	Nucsoft Ltd.
5	Disha Maggu	Reliance Retail, Zucus Infotech Pvt. Ltd.
6	Nimish Ambre	Zucus Infotech Pvt. Ltd.
7	Raveena Pitale	L&T Finance Ltd.
8	Sakshi Kaveri	Newgen Software Technologies Ltd.
9	Rishi Dubey	DevTown
10	Lovely Varshney	Alpha Payment LLP
11	Omkar Bidwai	Star Flexi Films
12	Jaipreet Saini	Exicom Ltd.
13	Russel D'mello	Exicom Ltd.
14	Sanskars	Digitrix Edutech Pvt.Ltd
15	Abhishek Wagmare	Digitrix Edutech Pvt.Ltd
16	Adarsh Rao	Piramal Pharma Ltd.

IEEE-DBIT STUDENT BRANCH

IEEE-DBIT SB 2024 OFFICE BEARERS

SR. NO.	POSITION	STUDENT NAME
1	Chairperson	Annanya Zadbuke (TE)
2	Vice-Chairperson	Dibyarupa Pradhan (TE)
3	Secretary	Kartik Dandelia (SE) Narayan Dalvi (SE)
4	Treasurer	Khushi Shetty (TE) Suhani Sawant (TE)
5	MTT-S Chair	Mohd. Raza (TE) Raj Mohite (TE)
6	SIGHT Chair	Zubia Sarang (SE) Aryan Arde (SE)
7	RAS Chair	Rutvik Patil (TE) Prem Singh (TE)
8	Reporting	Aditya Jadhav (TE) Aditya Punekar (SE)
9	Publicity	Mayuri Kadam (TE) Prerana Gawale (SE)
10	WIE Chair	Tanmayee Ahire (SE) Girish Sangare (TE)
11	Webmaster	Sanjeet Prajapati (TE) Pooja Kadam (TE)
12	Social Media	Aditya Dabhade (SE)

IEEE-DBIT ACHIEVEMENTS

ACHIEVEMENTS AT INTERNATIONAL LEVEL



IEEE DBIT among the Final Top Two Teams Selection Round of IEEE R10 Stage-I Robotics Competition ...

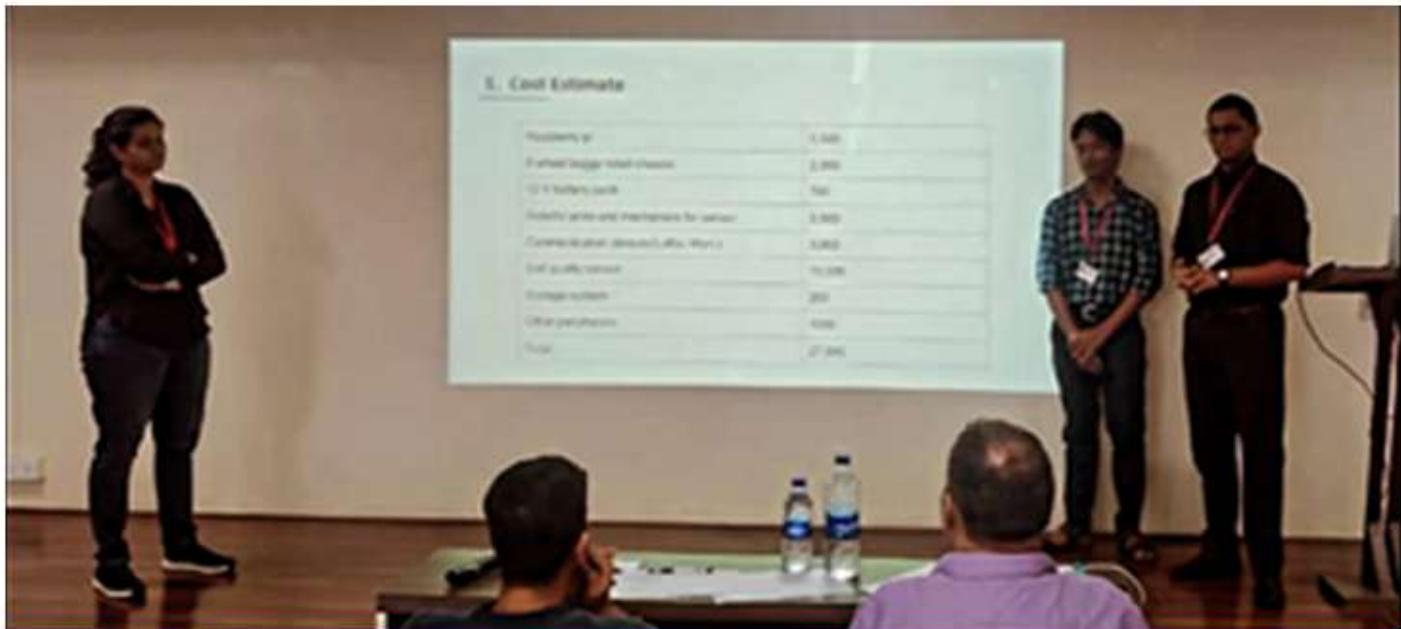
Team Members:

- Rutvik Patil
- Premkumar Singh
- Suhani Sawant

Faculty Advisor

- Ms. Freda Carvalho

ACHIEVEMENTS AT INTERNATIONAL LEVEL



**OUR TEAM QUALIFIED FOR STAGE - I OF
2023 IEEE R10 ROBOTICS COMPETITION**



**HEARTIEST CONGRATULATIONS TO THE TEAM
PREM SINGH, RUTVIK PATIL AND SUHANI SAWANT
FOR REPRESENTATING IEEE-DBIT**



ACHIEVEMENTS AT INTER COLLEGE LEVEL



Two of the 20 teams that participated in “Water Workshop and Competition” held at Vidyalankar Institute of Technology, Mumbai on 07 October 2023, followed by Competition on 14 October 2023 at Sardar Patel Institute of Technology, Mumbai, secured the 2nd and 3rd position in the Competition.



2nd POSITION

- Mr. Shafik Shaikh, TE
- Mr. Faiz Chougule, TE
- Mr. Girish Sangare, TE

3rd POSITION

- Mr. Kartik Dandelia, SE
- Ms. Zubia Sarang, SE
- Mr. Aryan Arde, SE
- Mr. Gavin Lobo, SE

OUTREACH PROGRAM BY IEEE-DBIT

"STEM ANTARIKSH – Outer Galaxies Astronomy Education" sponsored by IEEE Bombay Section was organised and conducted by IEEE DBIT team of 23 students and one faculty member, for students of Class 8 on 14 September 2023 in Karthika School and Junior College, Kurla (W) and in Mumbai Utkal English High School, Kurla (W) on 15 September 2023. The IEEE DBIT team reached out to a total of 109 students from the two schools.

STEM ANTARIKSH



SPECIAL INTEREST GROUP FOR HUMANITARIAN TECHNOLOGY (SIGHT)

A team of students and faculty made a field visit on 12 August 2023 to study Rural Development in Tribal Maharashtra and to explore the impact of Aga Khan Agency for Habitat India's initiatives in addressing these challenges.



VISIT TO SUSTAINABLE HOME CREATED BY TEAM SHUNYA



Ms. Freda Carvalho and Dr. Ashwini Kotrashetti along with a student team visited the sustainable home created by Team Shunya in IIT-B Campus on 22 March 2024.

VISIT TO SAMEER, POWAI

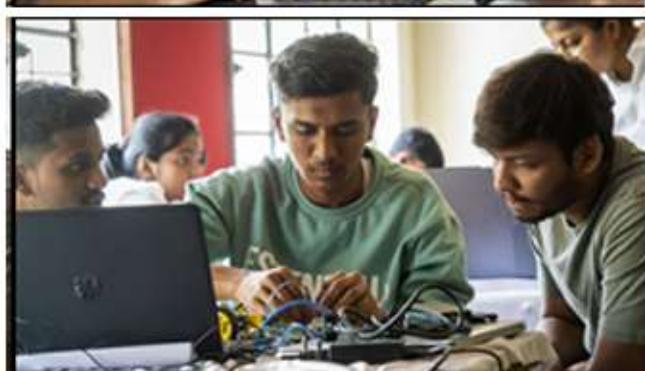
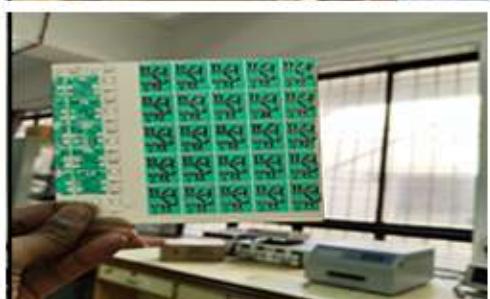
A team of students along with faculty members Dr. Ashwini Kotrashetti, Ms. Freda Carvalho, Ms. Namita Agarwal visited the RADAR Lab, LINEAC Division and EMI & EMC Division of SAMEER, Powai on 22 March 2024.



WORKSHOPS

PCB FABRICATION

A workshop on PCB fabrication and reflow oven techniques was conducted by Mr. Suyog Vyawahare, Field Application Engineer, Quectel and Mr. Prabhakar Gawali, for the SE & TE students on 02 March 2024.



AUTOBOTX

AutoBotX, a workshop aimed to educate participants on mechanical and electronics aspects of Automation, was an IEEE RAS funded activity organised from 26 February 2024 to 01 March 2024. The speakers for this workshop were Mr. Alister D'Silva of Absolute Motion Pvt. Ltd., Mr. Shreeprasad Manohar, Mr. Swapnil Gujarathi and Mr. Hemant Hogade (Faculty Members, MECH Dept.).

WORKSHOPS



TECHNICAL WRITING USING LaTeX

Ms. Freda Carvalho, IEEE DBIT SB Counsellor, conducted a Technical Writing Workshop using LaTeX for the SE students.

IEEE DBIT OFFICE BEARER'S CEREMONY



The IEEE DBIT Office Bearer's Ceremony attended by the past and present officer bearer's of IEEE DBIT SB Branch was held on 12 February 2024. The 2023 Office Bearer's were felicitated and the 2024 office bearers were introduced to the attendees.

INVITED TALKS

SR. NO.	TOPIC	SPEAKER	DATE
1	Talks on "Recent Advancements on High Frequency Communications"	Dr. Somak Bhattacharyya, Assistant Professor, IIT BHU	13-Jul-23
2	Mindful Engineering - Discussion on Leadership Responsibilities and to Provide Ethical Engineering Solutions to Societal Problems	Dr. Prasanna Nambiar (Ex-Principal, DBIT)	16-Aug-23

SYMPOSIUM / CONFERENCES ATTENDED BY FACULTY MEMBERS

- Ms. Pratibha Dumane attended the Two-Day Interdisciplinary National Conference (Virtual Mode) on “Technological Advancement in Computer Science: Artificial Intelligence, Machine Learning and Data Science”, organised by Dr. S.C. Gulhane Prerna College of Commerce, Science, and Arts, Reshimbag, Nagpur on 8-9 September 2023.
- Ms. Namita Agarwal attended Thought Leaders Conference 2023 on “Forging the Human-Machine Alliance” at Atlas SkillTech University, Mumbai on 02 November 2023.



CERTIFICATE COURSES / FACULTY DEVELOPMENT PROGRAMS (FDPs) / STTPs / WORKSHOPS / SEMINARS ATTENDED BY FACULTY MEMBERS



- Dr. Ashwini Kotrashetti and Ms. Freda Carvalho attended a two day workshop on “Building Stronger Partnerships” organised by L&T on 14-15 July 2023 at L& T Skill Trainers Academy.
- Ms. Namita Agarwal and Ms. Pratibha Dumane attended a Faculty Knowledge Sharing Programme on

“Creating Robust Teacher-Student Relationships for Optimum Learning Outcomes” at ICFAI Business School, Mumbai on 26 July 2023.

- All department faculty members attended the Investor Awareness Program on Financial Planning organised by CASI on behalf of HDFC Mutual Fund on 07 October 2023.
- Ms. Pratibha Dumane completed the certificate course on “Essential Non-Technical Skills of Effective Data Scientists” offered by Udemy.
- Dr. Ashwini Kotrashetti attended the L&T National STEM Challenge with 4 participating students of the Engineering Futures- CrEAST Program on 27 January 2024.
- Ms. Pratibha Dumane, Dr. Ashwini Kotrashetti, Ms. Hemalata Mote attended a session on “Towards a Bully-Free Campus” by Rev. Fr. Peter Gonsalves on 10 January 2024 at Don Bosco Institute of Technology, Mumbai.
- Ms. Pratibha Dumane completed the “Master Course: Fundamentals of Machine Learning” offered by Udemy.
- Dr. Ashwini Kotrashetti completed a self-paced course on, “ Linear To Circular Economy”, offered by Swayam NPTEL.

WEBINARS ATTENDED BY FACULTY MEMBERS

SR. NO.	FACULTY	WEBINAR TOPIC	ORGANIZED BY	DATE
1	Partibha Dumane	The Art of Writing Research Papers - An IEEE Perspective	Bharati Vidyapeeth's Institute of Computer Applications and Management (BVICAM), New Delhi	22-Jul-23
2	Namita Agarwal	Role of Microwave Engineering in Telecommunication Sector	VPM's Maharshi Parshuram College of Engineering, Velneshwar	12-Aug-23
3	Pratibha Dumane	Mendeley Reference Manager: An Effective Way to Organised Research	PVG, COET, Pune	18-Aug-23
4	Namita Agarwal	Critical Thinking: What is it about and how to develop it among our students	IUCEE	23-Aug-23
5	Namita Agarwal	Public Administration and AI: Future Directions	Bharati Vidyapeeth's Institute of Computer Applications and Management (BVICAM), New Delhi	07-Sep-23
6	Namita Agarwal	The Art of Being Happy and Resilient	Bharati Vidyapeeth's Institute of Computer Applications and Management (BVICAM), New Delhi	04-Nov-23
7	Pratibha Dumane	Future of Jobs	Bharati Vidyapeeth's Institute of Computer Applications and Management (BVICAM), New Delhi	08-Jul-24



IETE-DBIT-ISF STUDENT CHAPTERS

CORE COMMITTEE



SR. NO.	OFFICE BEARER	NAME
1	IETE-DBIT-ISF Coordinator	Mrs. Pratibha Dumane
2	Chairperson	Bhavesh Patil (TE)
3	Secretary	Neel Pujari (SE)
4	Treasurer	Prathamesh Kurdekar (SE)
5	Technical Coordinator	Aakash Belgaonkar (SE)
6	Creative Design	Yashi Nimje (SE)
7	Membership & Marketing	Aditya Shetty (SE)
8	Event & Logistics	Nisha Singh (SE)



IETE-DBIT-ISF



ACTIVITIES ORGANISED BY IETE-DBIT-ISF

- A series of Technical Aptitude Tests on various topics was launched for the students of DBIT to provide them with an opportunity to assess and enhance their technical aptitude and strengthen their understanding of core concepts in various subjects.
- An online session on “Beyond the Books: Thriving in the IIM Environment” by Prof. Dr. Sundaravalli Narayanswami, Professor, IIM- Ahmedabad was organised on 23 February 2024.
- A session on “Unlock Your Potential- A Guide to Excelling in Job Interviews” by Ms. Drushti Hande, Associate Director, Human Resource, NTT was organised on 22 March 2024.



SYNERGY - EXTC DEPARTMENT DAY

The Department Day “**Synergy**” was celebrated on 05 February 2024 with the theme “Around the World”. Students showcased their diverse talents through graceful classical dances, captivating solo and group singing and dance performances. Faculty members also joined in the celebration with their own performances, group dances, and songs, adding to the spirit of synergy and camaraderie within the department.

The event not only recognized academic excellence with the felicitation of top-performing students across the engineering years but also highlighted the significant contributions of students to the Training and Placement cell and student chapters like IETE and IEEE.

The event was a resounding success, fostering stronger bonds among the students and serving as a source of inspiration for them to further hone their skills.



INNOVEX 2024

INNOVEX- Project Exhibition and Competition was organised on 24 April 2024. It provides a platform for the BE students to showcase their final year projects. Mr. Quentin D'souza, CTO Qdnet Technologies Pvt. Ltd. and Mr. Santoshkumar Thombare, Scientific Officer, BARC were invited to judge the EXTC projects.

INNOVEX 2024 WINNERS

RANK	NAME OF STUDENT	PROJECT TITLE	GUIDE / CO-GUIDE
1	Rakshita Khantwal	Design and Development of a Meta-Surface Antenna for Sensing Applications	Dr. Ashwini Kotrashetti / Ms. Freda Carvalho
	Suraj Kumar		
2	Sanskars Kumar	Development of a Container GPS tracking system to Enhance Supply Chain Security	Ms. Freda Carvalho
	Russel Dmello		
	Sakshi Kaveri		
	Shreyas Nanaware		
3	Benish Christo Louis	Smart Water Management using LoRaWAN	Ms. Poonam Chakraborty
	Leroy Rodrigues		
	Deep Patel		
	Simran Koparkar		

LATE PROF. D. SUNDARARAJAN AWARD

1	Lovely Varshney	Advance Navigational System for Accurate GPS Localization	Dr. Ashwini Kotrashetti / Mr. Joshua Michael
	Abhishek Waghmare		
	Adarsh Rao		
	Gouresh Sankhe		





SECOND YEAR ENGINEERING



THIRD YEAR ENGINEERING



FINAL YEAR ENGINEERING