



# **DIEMS-E&TC EMBEDDED SYSTEM TRAINING VIDYALEAP PROGRAM 2024 REPORT**



Department of Electronics and Telecommunication Engineering at Deogiri Institute of Engineering and Management Studies, Chh. Sambhajinagar is pleased to present a report on the Embedded System Training conducted under the prestigious VidyaLeap Program. The program was organized by the Inter Institutional Inclusive Innovations Center (i4C), a pioneering non-profit organization championing innovation and skill development.

## **OVERVIEW OF I4C & VIDYALEAP PROGRAM**

i4C, an independent, non-profit entity, is dedicated to fostering a culture of innovative thinking and societal impact through initiatives such as the VidyaLeap Program. The VidyaLeap program is an advanced upskilling initiative designed to equip students in fields like Electronics and Telecommunication Engineering with industry-ready skills in embedded systems. The program, founded by industry stalwarts such as Mr. Vivek Pawar, Acting CEO of Vidyaleap & Founder of Sankalp Semiconductor, Mr. Sanjay Bhandari, Dean R&D, K J Somaiya College of Engineering, Mr. Satish Deshpande, Experienced Professional, Mr. Subodh Rautmare, Founder & Director, Embius Technologies and Mr. Sandip Sans, Founder CEO, Evobi Automation Pvt. Ltd., is focused on producing employable talent for the industry while instilling an entrepreneurial spirit among students.

## **OVERVIEW OF TRAINING**

Department of Electronics and Telecommunication Engineering at Deogiri Institute of Engineering and Management Studies, conducted Embedded System Training program for the Final Year E&TC students, facilitated by the VidyaLeap Program under i4C. This program aimed to provide in-depth knowledge and hands-on experience in embedded system design, particularly focusing on the Texas Instrument's LP-MSPM0G3507 Development Board. A total of 30 E&TC students were selected based on an online examination that tested their proficiency in basic electronics, C programming, and mathematical skills.

The program started with a Inauguration Function on July 19, 2024 in presence of Mr. Vivek Pawar, CEO, Vidyaleap, Dr. Arti R. Wadhekar, HOD E&TC, Mr. Amarsingh Mali, T&P Officer, Dr. Sanjay B. Kalyankar, Dean T&P, Dr. Rajesh M. Autee, Professor, Mr. Anil D. Wakode & Mr. Mahesh S. Badmera, Faculty Coordinators.

The training program commenced with 15-day intensive training session during July 19, 2024 to July 31, 2024 conducted by VidyaLeap Team. These sessions were conducted at Embedded System Lab, E&TC Department, DIEMS. During these two weeks, students worked with the LP-MSPM0G3507 Development Board from Texas Instruments. The training covered various key topics, including:

- General Purpose Input/Output (GPIO)
- Interrupts and Timers
- Communication protocols such as UART, SPI, I2C, and CAN
- C Programming and Embedded C Programming
- Overview - RS232, RS485, RS422
- Basics of Microcontroller
- Introduction to Code Composer Studio (CCS) IDE

These sessions, conducted under the expert guidance of renowned industry professionals, provided students with hands-on experience in designing and developing embedded systems. Mr. Vivek Pawar, Acting CEO of VidyaLeap and Founder of Sankalp Semiconductor, conducted the first two days of the training, focusing on logic building and problem-solving. Mr. Subodh Rautmare led the third day's session on embedded system basics, followed by Mr. Rahul Hawrale, who conducted sessions on various topics related to embedded systems and the Texas Instruments LP-MSPM0G3507 development board. In addition to technical skills, soft skills sessions were also conducted for the students.

Following the initial intensive training, daily two-hour sessions were held in the Embedded System Lab at DIEMS, led by Mr. Anil D. Wakode, Faculty Coordinator from the E&TC Department. These self-learning modules allowed students to explore embedded system concepts at their own pace. Every Saturday, online meetings with the VidyaLeap team were conducted to review students' progress and introduce additional topics related to embedded systems. The students' dedication and commitment were further demonstrated through their hands-on work with the Texas Instruments LP-MSPM0G3507 development board. They learned the architecture of the board and wrote various programs to perform real-time operations.

Dr. Subhash V. Lahane, Director I/c, Mr. Amarsingh Mali, Head T&P Officer, Dr. Sanjay B. Kalyankar, Dean T&P and Dr. Arti R. Wadhekar, HOD E&TC were key in the success of the Embedded System Training program. Their vision and continuous support helped the program run smoothly and achieve its goals. Mr. Anil D. Wakode, Faculty Coordinator, played an important role in making the program a success for the students and the department and also organizing the training sessions and ensuring that students had access to all necessary resources.

The Embedded System Training, facilitated under the VidyaLeap program, proved to be an exceptional learning opportunity for the students of the E&TC department at DIEMS. By bridging the gap between theoretical knowledge and real-world applications, the program allowed students to acquire industry-relevant skills in embedded systems.

As a result of this training program, All the students were offered a 5-month internship by i4C, with the potential for job placements based on their performance. This initiative also laid the foundation for future collaborations between DIEMS and i4C. A Memorandum of Understanding (MoU) was signed to ensure continued partnerships, which will further enhance the skill development of students. Moreover, DIEMS provided each participating student with a Texas Instruments LP-MSPM0G3507 development board, enabling them to continue enhance their skills.

Through these collective efforts, the department of E&TC remains committed to providing quality education and skill development, empowering students to excel as future leaders in the industry.

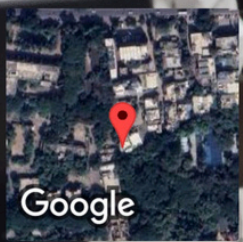
## LIST OF STUDENTS

No.	Name of Student	Class
1	Om Doifode	B.Tech - A
2	Suryakant Kulkarni	B.Tech - A
3	Sandesh More	B.Tech - B
4	Swanand Mande	B.Tech - B
5	Shravani Shastri	B.Tech - B
6	Tanvi Varade	B.Tech - B
7	Mansi Shirude	B.Tech - B
8	Darshan Bhangale	B.Tech - B
9	Ishwari Gadge	B.Tech - A
10	Anusha Shetty	B.Tech - B
11	Pranav Rathod	B.Tech - B
12	Darshan Rathod	B.Tech - B
13	Nandini Rathod	B.Tech - B
14	Nivrutti Kakde	B.Tech - A
15	Kunal Mehta	B.Tech - B

No.	Name of Student	Class
16	Tanvi Sawji	B.Tech - B
17	Aryan Mohite	B.Tech - B
18	Khushi Katariya	B.Tech - A
19	Siddhi Kulkarni	B.Tech - A
20	Priya Salodkar	B.Tech - B
21	Om Mohite	B.Tech - B
22	Pavan Mokase	B.Tech - B
23	Sakshi Morewar	B.Tech - B
24	Pavan Gaware	B.Tech - A
25	Isha Thombre	B.Tech - B
26	Ajinkya Wakhure	B.Tech - B
27	Netra Deshpande	B.Tech - A
28	Harshwardhan Mali	B.Tech - B
29	Utkarsha Rushipathak	B.Tech - B
30	Rushikesh Bodhke	B.Tech - B



GPS Map Camera

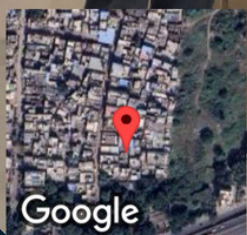


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V8CF+68M, Snehnagar, Konkanwadi, Aurangabad, Maharashtra 431005, India  
Lat 19.871018°  
Long 75.323544°  
19/07/24 10:31 AM GMT +05:30

Mr. Vivek Pawar, CEO, Vidyaleap, Dr. Sanjay B. Kalyankar, Dean T&P, Mr. Amarsingh Mali, T&P Officer, Dr. Arti R. Wadhekar, HOD E&TC, Dr. Rajesh M. Autee, Professor, Mr. Anil D. Wakode & Mr. Mahesh S. Badmera, Faculty Coordinators during the Inauguration Function of Vidyaleap Training Program at DIEMS.



GPS Map Camera

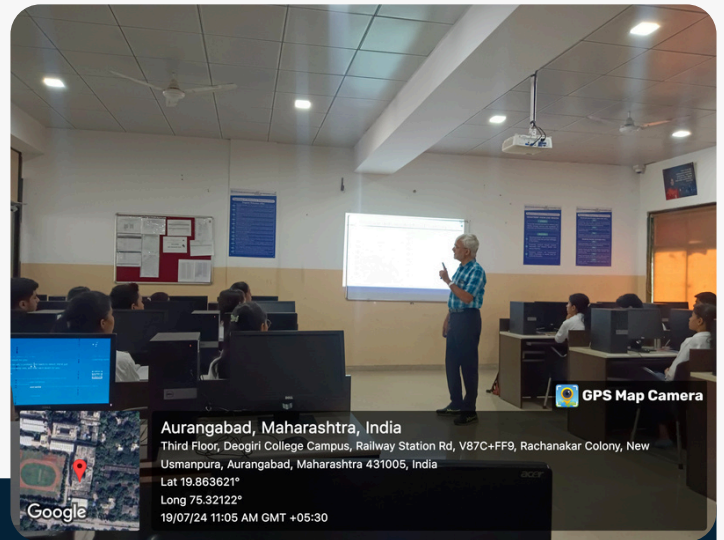


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5/1-303, Santa Nagar, Aurangabad, Maharashtra 431005, India  
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Felicitation of Mr. Vivek Pawar, CEO, Vidyaleap by Dr. Sanjay B. Kalyankar, Dean T&P



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20295/2/56/A/1, Adalat Rd, Kotia Colony, Chhatrapati Sambhajnagar (Aurangabad), Maharashtra  
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Long 75.322639°  
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Third Floor, Deogiri College Campus, Railway Station Rd, V87C+FF9, Rachanakar Colony, New  
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**Session on Logic Building and Problem Solving conducted by Mr. Vivek Pawar**



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21/07/24 04:46 PM GMT +05:30



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Maharashtra 431005, India  
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**Session on Basics of Embedded System conducted by Mr. Subodh Rautmare**



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Maharashtra 431005, India  
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Aurangabad, Maharashtra, India  
Deogiri Campus, Railway Station Road, Rachanakar Colony, New Usmanpura, Aurangabad,  
Maharashtra 431005, India  
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**Students interacting with the Texas Instrument's LP-MSPM0G3507 Development Board and Code Composer Studio (CCS) IDE during the Vidyaleap Training Program.**



## Session on Programming of Texas Instruments LP-MSPM0G3507 Development Board using Code Composer Studio (CCS) IDE conducted by Mr. Rahul Hiwrale



Students standing together with Mr. Rahul Hiwarale, Trainer, Vidyaleap, Mr. Anil D. Wakode, and Mr. Mahesh S. Badmerna, after completing the 15-day Embedded System Training sessions. The successful collaboration and collective achievement of both students and trainers are captured in the image.