Dr. D. Y. Patil College of Engineering and Innovation

Varale, Talegaon, Pune

e-bulletin

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Our Inspiration

I am very proud to share that our College under D. Y. Patil Education Federation (DYPEF) is one of the most eminent Higher Educational Institution today and is renowned for standards of its Faculties, Students and Alumni. It is constantly pushing the frontiers of knowledge and ensures the futuristic approach that keeps pace with the changing trends of the professional world

Padmashree (Dr.) D. Y. Patil Founder of DYPATILEF, Pune.

From Presidents Desk

DYPEF nurtures the students with innovative teaching-learning atmosphere well equipped with state of art infrastructure and strong academic and administrative systems. We trust in serving the society through quality education that empower us to generate quality human resources. We believe that education should foster confidence, discipline, clarity in thought and decision-making ability to set and achieve goals, and above all, social responsibility as a life-long process.

Dr. Sushant Patil, PhD, MBA, LLB, BSL
President of DYPATILEF, Pune.

From Secretary Desk

We strongly believe that every young mind is to be moulded in a way best suited with the best skills that individual has and to bring out the best in him/her. To discover the hidden talents of students and to bring out their innovative best.

Mrs. Anuja Patil, BSL LLB, LLM, B.Ed
Secretary of DYPATILEF, Pune.

From Executive Director Desk

DYPEF campus, a temple of learning and a hallmark of discipline, treads towards the pinnacle of glory by providing quality education to meet the global standards. The organization is one of the most eminent Higher Education Institutions today, and it is renowned for the standards of its teaching methodology, facilities and students.

Mr. Vidyanand Mankar, B.Com, D. C. M., Oracle B++
Executive Director of DYPATILEF, Pune.

From Principal Desk

We at DYPCOEI are continuously striving to impart value-based education to elevate satisfaction level of all stakeholders. We all are ready to Take dedicated efforts to create competent professionals by effective teaching learning process with passion of lifelong learning attitude.

Dr. Suresh Mali, Ph.D., M. E. (Computer Applications)
Principal, DYPCOEI, Pune.

Vision

To achieve excellence in quality education through value based rapidly changing technologies and create technical Human-Resource with proficiencies of accepting new challenges.

Mission

M1 *Continuously strive to impart value-based education to elevate the satisfaction level of all stakeholders.*

M2 *Take dedicated efforts to create competent professionals by effective teaching learning process with passion of lifelong learning attitude.*

M3 *Our endeavor is to promote and support innovative research, entrepreneurship and development activities through Industry Interaction.*

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Institute Milestone

NBA – BE COMPUTER ENGINEERING (2025 – 2028)

Department of Computer Engineering accredited by National Board of Accreditation (NBA) for 3 Years from 2025-28.

MOU - MEMORANDUM OF UNDERSTANDING

Dr. D. Y. Patil College of Engineering & Innovation, Varale has signed a Memorandum of Understanding (MoU) with Edunet Foundation, Gargaon on 15th July 2025.

Signing MoU with Eventbeep fo Technoservices Pvt. Ltd for Placement Support Portal while Implementing a secure system for student profile and placement tracking on 16th July 2025.

AUTONOMOUS INSTITUTE

Dr. D. Y. Patil College of Engineering and Innovation, Pune approved by AICTE as an Autonomous Institute from A.Y 2025-26 to A.Y 2034-35 and recognized by SPPU.

Autonomous – (10 Years)

2025- 26 to 2034 – 35

NAAC – (5 Years)

2024- 25 to 2028 -2029

NBA – (3 Years for Computer Engineering Department)

2025-26 to 2027-28

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Student Achievements

E-CELL – IIT BOMBAY

"E-Cell" IIT Bombay helps the hustling startups and young professionals via dynamic workshops, thought-provoking speaker sessions, high-stakes business plan competitions, and numerous other game-changing initiatives throughout the year to create a crucible for innovation. It stands as pillars of support for budding entrepreneurs, providing them with personalized guidance from experienced mentors, crucial funding opportunities, and a robust network that can change the course of their journey forever!"

It was initiated by Mr. Siddharth Bellundagi, Second Year Computer Engineering student along with his team members Pratiksha Kshirsagar, Shraddha Muley, Viraj Dhaigude, Dnyanda Dhavale, Mahek Kohli, Aniket Zimane, Anuj Mhaisdhune.

Prof. (Dr.) Alpana Adsul, Head of Computer Engineering appreciated and appointed Mrs. Anamika Wasnik, Assistant Professor as a Co-ordinator for E-Cell. "E-Cell" formed at DYPCOEI, Varale campus on 18th July 2025, on that day E-Cell Logo was launched.

Faculty Achievements

COPY RIGHTS

Prof. (Dr.) Suresh Mali, Principal, DYPCOEI, Varale Copyrights has been registered for the work titled **"Secure Steganographic Embedding to Improve Image Tracking"** in accordance with the provisions of the Copyright Act,1957, **Certificate No.: LD- -20250168997.**

Prof. (Dr.) Suresh Mali, Principal, DYPCOEI, Varale and **Ruturaj Ramchandra Dharne, Darshana Dilip Borole, Pratiksha Nitin Bangar** BE AI-DS Students Copyrights has been registered for the work titled **"Feature Based Classification of Farmers for Automatic Communication of Required Agriculture Products"** in accordance with the provisions of the Copyright Act,1957, **Certificate No.: LD- 20250166494.**

Prof. (Dr.) Dipannita D. Mondal, IQAC Coordinator & Head of Department of AI-DS and **Soham Manoj Gholap, Sarthak Narayan Ghodke, Parth Pandharinath Mane, Vivek Machindra Vanave** BE AI-DS Students Copyrights has been registered for the work titled **"AI-driven Symptom Analysis and Disease Prediction Assistant for Healthcare"** in accordance with the provisions of the Copyright Act,1957, **Certificate No.: LD-20250168119.**

Dr. Pravin Latane, Associate Professor, Department of Computer Engineering Copy Rights has been registered for the work titled **"A Clever Way To Refine The Research Title And Turn A Research Variable Into Research Objective"** in accordance with the provisions of the Copyright Act,1957, **Certificate No.: LD-20250168030.**

Dr. Sopan Shinde, Assistant Professor, Department of Computer Engineering Copy Rights has been registered for the work titled **"Metric-topological Analysis Device"** Date of ROC: 14/07/2025, Application No.: 2174/2025-CO/L, in accordance with the provisions of the Copyright Act,1957**,** **Certificate No.: LD- 20250167988.**

Mr. Sagar Dhanake, Assistant Professor, Department of Computer Engineering and **Trupti Sonar, Sharvary Raut, Vaishnavi Sabale, Shivani Tarwade** BE Computer Engineering Students Copy Rights has been registered for the work titled **"Disease Prediction Based On Classification of Blood Cells Smear Images"** Date of ROC: 24/07/2025, Application No.: 4019/2025-CO/L, in accordance with the provisions of the Copyright Act,1957**,** **Certificate No.: LD- 20250169084.**

Mr. Arivanantham Thangavelu, Assistant Professor, Department of Computer Engineering Copy Rights has been registered for the work titled **"Credit Card Fraud Detection Using Machine Learning"** Date of ROC: 15/07/2025, Application No.: 10088/2025-CO/L, in accordance with the provisions of the Copyright Act,1957, **Certificate No.: LD-20250168174.**

Mr. Santosh Kawade, Assistant Professor, Department of Computer Engineering and Akanksha Deshmukh, Sejal Jadhav, Omkar Bankar BE Computer Engineering Students Copy Rights has been registered for the work titled **"Securing Children From Inappropriate And Harmful Things On The Internet"** Date of ROC: 21/07/2025, Application No.: 4168/2025-CO/L, in accordance with the provisions of the Copyright Act,1957**,** **Certificate No.: LD- 20250168568.**

Mrs. Chaitali Sartape, Assistant Professor, Department of Computer Engineering and Copy Rights has been registered for the work titled **"Fussion of Yolov5 And Faster R-cnn For Potholes Detection And Make Road Devoid Of Potholes"** Date of ROC: 18/07/2025, Application No.: 3280/2025-CO/L, in accordance with the provisions of the Copyright Act,1957**,** **Certificate No.: LD- -20250168477.**

CERTIFICATE

Prof. (Dr.) Alpana Adsul, Head of Computer Engineering Department has successfully Completed the certified Yoga Therapist Course under the guidelines of **Yogism Yoga Institute** and is hereby recognized as a **"Certified Yoga Therapist"** Certification ID: YYI-YTh-1279-2025.

IPSC I.T FEST 2025 – JUDGE

Mr. Vishal Kisan Borate, Assistant Professor, Computer Engineering Department **Appreciated** for his valuable time and contribution for being a **Judge** during **the "IPSC I.T FEST 2025"** held at B. K. Birla Centre For Education, Pune.

POSH ACT 2013 – TRAINING

Prof. (Dr.) Alpana Adsul, Head of Computer Engineering, **Prof. (Dr.) Dipannita D. Mondal,** IQAC Coordinator & Head, Department of AI-DS and **Mrs. Anita Shinkar,** Assistant Professor have attended and completed one-day training on the **POSH ACT 2013** (The Sexual Harassment of Women at Workplace: Prevention, Prohibition and Redressal Act, 2013 inclusive of UGC and AICTE Regulations) on 19th July 2025.

RESOURCE PERSON

Mrs. Abha Pathak, Assistant Professor, Department of Computer Engineering has invited as a Resource Person for the webinar organized by School of Computer Applications, PCETs PC University, Pune. She delivered content on "Explore Machine Learning: Transforming Ideas into Intelligent System" on 1st July 2025.

WORKSHOP

Mrs. Abha Pathak, Assistant Professor, Department of Computer Engineering has actively participated in the Workshop on **"Artificial Intelligence & Machine Learning"** organized by Elythra Edufyi Tech Solutions held from 12th July 2025.

FACULTY DEVELOPMENT PROGRAM

Mrs. Abha Pathak and Mrs. Poonam Sadafal Assistant Professor, Department of Computer Engineering has successfully completed the **"Common Yoga Protocol Training Course"** conducted in Virtually by Department of Yogashastra, Degree College of Physical Education, Amravati from 1st - 21st June 2025.

Mr. Sunil Kumar Yadav, Assistant Professor, Department of Computer Engineering has successfully completed One Week Faculty Development Program on **"INTELECT: Innovation in Technology, Learning & Computing Trends"** Sponsored by Department of Computer Engineering, Swami Logipool Infotech, Pune & Organized by Shri Chatrapati Shivaji Maharaj College of Engineering Nepti, Ahilyanagar, from 26th June to 01st July 2025.

Prof. (Dr.) Alpana Adsul, Head of Computer Engineering **Mr. Vishal Kisan Borate** and **Mrs. Shubhangi Kshirsagar,** Assistant Professor, form Computer Engineering successfully participated in the Faculty Orientation Program on **"Data Structures (SE Computer, 2024 Pattern)"** organized by the Department of Information Technology association with Board of Studies (Computer Engineering), Savitribai Phule Pune University(SPPU), Pune held on 15th July 2025.

Mrs. Abha Pathak, Assistant Professor, Department of Computer Engineering has successfully participated one-week short term online course on **"Bridging AI and Explain ability with AI Fundamentals and Applications"** organized by the Department of Computer Science and Engineering, ABV-IIITM, Gwalior held from 5th – 9th July 2025.

Mr. Arivanantham Thangavelu, Mr. Sunil Kumar Yadav, Mr. Vishal Kisan Borate, Mr. Santosh Kawade and **Mrs. Shubhangi Kshirsagar** Assistant Professor, Department of Computer Engineering for active participation in 2-Weeks Online FDP on **"Unlock The Power of AI in Education and Research",** organized by the First Year School of Engineering & Technology, Pimpri Chinchwad University, Sate, Maval, Pune, held from 14th – 25th July 2025.

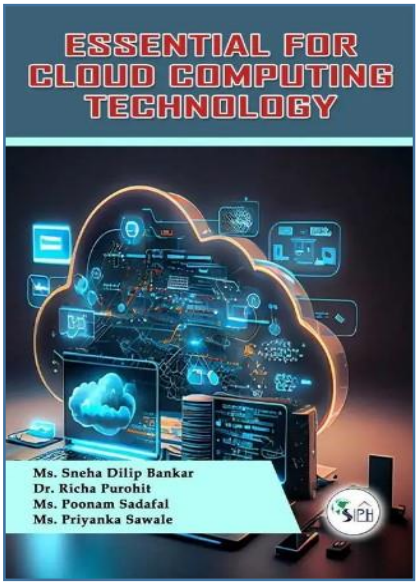
Mr. Vishal Borate, Mr. Santosh Kawade, Ms. Shubhangi Kshirsagar and **Ms. Aradhana Pawar,** Assistant Professor, Dr. D. Y. Patil College of Engineering and Innovation has successfully participated in the Faculty Development Program on **"Digital Electronics and Logic Design (SE Computer ,2024 Pattern, implemented with NEP 2024 Police)** by the Department of Computer Engineering association with Board of Studies (Computer Engineering), SPPU, Pune held on 24th July 2025.

BOOK PUBLICATION

Mrs. Poonam Sadafal, Assistant Professor, Department of Computer Engineering and

Ms. Sneha Bankar, Assistant Professor, AI-DS published book entitle on **"Essential for Cloud Computing Technology"** by **SIP Publisher, ISBN**: 9789366740508.

https://www.flipkart.com/product/p/itme?pid=9789366740508



Pre-Placement Training

PYTHON TRAINING

Python Training provides a structured approach to mastering data structures, algorithms, and essential coding skills, ensuring well-equipped for every phase of the placement process. Explore the course to give your preparation the extra edge needed to succeed. Department of Computer Engineering organized Pre-Placement training for BE Computer Engineering students.

Mr. Shubham Sonawane, Trainer, Gyanteerth, Pune started Python Training from 30th June to 19th July 2025.

Day 1 (30-06-2025)

Mr. Shubham Sonawane, Trainer, Gyanteerth, Pune started Python Training Session - Morning Session Introduction about Python.

Python training on "Fundamentals of Python" by Mr. Shubham Sonawane on 30th June 2025.

1. What is programming language? and levels of programming language.
2. History of Python

3. Comments in Python
4. Data Types in Python
5. Features of Python
6. Process of Python code execution
7. Unique data types

Afternoon Session Laboratory practice to execute Python code by different Software Tools.

Day 2 (01-07-2025)

The trainer taught "String Operations". understanding the **core ideas** behind manipulating and working with strings in Python. Afternoon Session Laboratory practice to implement Python program practice in String.

Day 3 – (02-07-2025)

The trainer trained on **"Operators**" - operators are special symbols or keywords used to perform operations on variables and values. Afternoon Session Laboratory practice to print program to implement operators in Python.

Day 4 – (03-07-2025)

The trainer educated online session on "String Functions" – upper(), lower(), replace(), strip(), find(), index(), split(), join() etc. String formatting – using format() method and using f-string. Escape character & Multiline – newline, Tab, quotes, backslash,

List – creating a list and accessing list elements. Afternoon Session Laboratory practice to print String function & create List program in Python.

Day 5 – (04-07-2025)

The trainer educated session on "String Examples" - how to create, access, compare, join, iterate and format strings in Python. See the syntax, methods and escape sequences of strings with examples and code snippets. Afternoon Session Laboratory Practice String examples program in Python.

Day 6 – (05-07-2025)

The trainer educated session on "Dictionary Methods" - Python provides several built-in methods for dictionaries that allow for efficient manipulation, access, and transformation of dictionary data. Afternoon Session Laboratory practice dictionary various built-in methods program in Python.

Day 7 – (07-07-2025)

The trainer imparted session on "Control Statements" - Control statements in Python are used to manage the flow of execution in a program. They allow you to make decisions, repeat actions, or skip parts of the code based on specific conditions. Afternoon Session Laboratory practice execution of Control Statements program in Python.

Day 8 – (08-07-2025)

The trainer imparted session on "Functions" – functions are reusable blocks of code designed to perform a specific task. Function help make programs modular, readable, and efficient.

Day 9 – (09-07-2025)

The trainer taught session on “Lambda Functions, Map Functions, and Decorators” – Lambda functions are anonymous, single-expression functions defined using the lambda keyword. They are often used for short, throwaway functions.

The map() function applies a given function to all items in an iterable (like a list) and returns a map object (which can be converted to a list).

Day 10 – (10-07-2025)

The trainer taught session on “Object Oriented Programming”. Afternoon Session Laboratory practice implementation of OOPs program in Python.

Python training on “Object Oriented Programming” by Mr. Shubham Sonawane on 10th July 2025.

Day 11 – (11-07-2025)

The trainer taught session on “Abstraction, @Property and Using @property decorator” - abstraction is achieved using abstract classes and methods, which are defined using the ABC module from the abc package. Abstract properties can also be defined using the @property decorator in combination with @abstract method. Afternoon Session Laboratory practice program in abstraction implementation in Python.

Day 12 – (12-07-2025)

The trainer taught session on “Advanced Data Structure” – Advanced Data Structures refer to complex and specialized arrangements of data that enable efficient storage, retrieval, and manipulation of information in computer science and programming. These structures go beyond basic data types like arrays and lists, offering sophisticated ways to organize and manage data for optimal performance in various algorithms and applications. Afternoon Session Laboratory practice in different types of sorting algorithms.

Day 13 – (14-07-2025)

The trainer taught session on “Linked List” – A linked list is a fundamental data structure in computer science. It mainly allows efficient insertion and deletion operations compared to arrays. Afternoon Session Laboratory practice in Linked List algorithms.

Day 14 – (15-07-2025)

The trainer taught session on “Recursion and Backtracking” – Recursion is a programming technique where a function calls itself to solve

smaller instances of a problem. Backtracking, on the other hand, is a specialized form of recursion used to solve problems by exploring all possible solutions incrementally.

Afternoon Session Laboratory practice in Recursion and Backtracking.

Day 15 – (16-07-2025)

The trainer taught session on “Hashing and Collision” – hash functions were used to generate hash values.

The hash value is used to create an index for the keys in the hash table. The hash function may return the same hash value for two or more keys. When two or more keys have the same hash value, a collision happens.

Afternoon Session Laboratory practice in Hashing and Collision.

Day 16 – (17-07-2025)

The trainer taught session on “Tree Data Structure” – Tree data structure is a hierarchical structure that is used to represent and organize data in the form of parent child relationship and different types of trees in data structure. Afternoon Session Laboratory practice in Tree Data Structure.

Day 17 – (18-07-2025)

The trainer taught session on “Data Structure in Graph theory” – Graph Data Structure is a collection of nodes connected by edges. It's used to represent relationships between different entities and different types of searching algorithm. Afternoon Session Laboratory practice in Data Structure in Graph theory.

Day 18 – (19-07-2025)

The trainer conducted intermediated level test in Python and Advance Data Structure concept.

The Python training program successfully provided BE Computer Engineering students with a strong fundamental and Advanced Data Structure concepts.

Through hands-on sessions, coding assignments, and real-time problem-solving activities, learners gained practical exposure to object-oriented programming. Strong understanding of Python coding and Data Structure algorithms.

The Python Training session aimed to strengthen the programming skills required for campus placements for students.

Prof. (Dr.) Alpana Adsul, Head of Computer Engineering felicitating Mr. Shubham Sonawane, Trainer, Gyanteerth, Pune conducted Python training on 19th June 2025.

PYTHON WITH DSA TRAINING

Department of AI-DS organized Python with DSA Training for BE students. Training provides a structured approach to mastering data structures, algorithms, and essential coding skills, ensuring well-equipped for every phase of the placement process.

Week 1: Core Python + OOP

Week 2: Data Structures and Algorithm

1. Develop strong foundational and practical Python programming skills in students, enabling them to solve real-world problems, build object-oriented applications, and confidently face coding interviews and placement assessments.
2. Understand OOP principles, control structures, arrays, strings, exception handling, and file I/O.
3. Practice coding challenges frequently asked in campus placements, online assessments, and technical interviews. Solve problems using Python with optimized logic and clean code practices.
4. Learn DSA concepts with hands on coding and competitive leetcode problems solving.

Week 3: Linked Lists, Recursion, Trees, Greedy algorithm Advanced Dynamic Programming & Mock Coding Rounds and leetcode problem solving.

Day 1 – (30-06-2025)

Ms. Snehal Sadgir conducted a Python Training Session as part of the pre-placement training for BE AI-DS students.

Morning Session the trainer began with an Introduction to Python Programming, highlighting its importance in the IT industry and placement preparation. Session also covered the Scope of Python, including its use in startups, MNCs, Basic programming concepts such as variables, data types and input methods were explained using simple examples to build a strong foundation. In afternoon a session was conducted focusing on the If Else concept with real-time problem-solving exercises like “checking a word is vowel or consonant”.

Python with DSA training by Ms. Snehal Sadgir, Trainer, Gyanteerth, Pune for BE AI-DS students on 30th June 2025.

Day 2 – (01-07-2025)

The trainer took while loop concept with additional practice problems to enhance logical thinking. The concept of strings was introduced, including string operations, slicing, and manipulation, which are

frequently asked in coding interviews. Students implemented “Guess the Number” game program where the program takes input as a number to guess a predefine number in given chances. Students learned about list creation, indexing, built-in functions, and common use-cases. The session was followed by coding exercises to work with both strings and lists, focusing interview-style questions.

Day 3 – (02-07-2025)

The third day emphasized the for loop, range() function, and pattern printing with stars (*), essential for clearing coding rounds. How to print Right-angle triangle, Inverted triangle, Square and rectangle, Hollow rectangle using conditional logic for borders. Students wrote and executed code for these patterns, improving their understanding of nested loops and conditional statements. Data structures like tuple, dictionary and set topic were covered with a problem solving like “converting list to tuple, append the items in tuples, accessing key values in dictionary”

Day 4 – (03-07-2025)

The trainer educated session on “Functions” - a block of reusable code that performs a specific task. Functions help break programs into smaller, manageable parts and avoid code repetition. Practice creating user-defined functions using previously learned concepts: Writing functions that take lists or sets as input (e.g., sum of list, removing duplicates using sets) Afternoon Session covered difficult problems -Finding Fibonacci series, finding prime number, Armstrong number, determine word is anagram, palindrome or not, count the vowels in sentence, finding divisor of numbers etc.

Day 5 – (04-07-2025)

The fifth day focused on Python’s built-in functions and functional programming tools such as map(), reduce(), and lambda expressions. Iteration through lists, strings, and dictionaries was reinforced with real-life examples. Students also solved beginner-level coding problems from LeetCode using these concepts, enhancing their logical thinking and syntax familiarity.

Day 6 – (05-07-2025)

The sixth day introduced the core Object-Oriented Programming concepts in Python. Students learned how to define and use classes and objects to structure code effectively. The session also explained Encapsulation (hiding internal details using private variables) and Abstraction (showing only essential features while hiding the complexity). Real-life examples like a Bank Account or Student class were used to demonstrate these ideas.

Day 7 – (07-07-2025)

The seventh day of training focused on Inheritance and Polymorphism, two core concepts

of object-oriented programming. Students learned how to reuse and extend existing classes using inheritance and how polymorphism allows the same method to behave differently depending on the object.

Practical coding examples and beginner-level LeetCode problems were solved using these concepts.

Day 8 – (08-07-2025)

The eighth day introduced two important linear data structures: Stack and Queue. Students learned how to implement them using Python's list, collections, deque, and by creating custom classes.

Real-world problems such as Balanced Parentheses and Infix to Postfix conversion were implemented using stack logic, helping students understand how data structures solve real algorithmic challenges.

Day 9 – (09-07-2025)

The ninth day focused on key algorithmic topics: Searching and Sorting. Students explored basic and efficient techniques for searching (Linear and Binary Search) and learned the logic behind important sorting algorithms like Merge Sort and Quick Sort. Dry-run exercises, trace tables, and step-by-step walkthroughs helped them understand how each algorithm works internally. Custom sorting using key functions in Python was also practiced.

Day 10 – (10-07-2025)

The tenth day introduced efficient algorithmic techniques: Sliding Window and Two-Pointer, which are frequently used in coding interviews and competitive programming. These approaches optimize brute-force solutions for problems like finding the maximum sum subarray, longest subarray with condition, and pair with a target sum. Students practiced these techniques on various array and string problems from platforms like LeetCode.

Day 11 – (11-07-2025)

The eleventh day introduced the Linked List data structure — a fundamental concept in computer science. Students learned how to manually create a linked list using Python classes, and how to perform essential operations such as traversal, insertion, deletion, and reversal. Emphasis was placed on understanding pointer manipulation and visualizing the linked list structure through whiteboard dry runs.

Day 12 – (12-07-2025)

On the twelfth day, the session extended the knowledge of Linked Lists by introducing various types of linked lists beyond the basic singly linked list. Students learned the structure, advantages, and real-world applications of Singly, Doubly, and Circular linked lists. The session included diagram explanations, pointer tracing on the whiteboard, and Python-based implementations.

Day 13 – (14-07-2025)

On the thirteenth day, the session advanced into more complex Linked List problems that are commonly seen in coding interviews and technical assessments. Students explored the Various Algorithm in linked lists, recursive reversal, and two-pointer techniques applied to linked list structures.

Day 14 – (15-07-2025)

The fourteenth day introduced one of the most important non-linear data structures in computer science – the Tree. Students learned how to manually create a Binary Tree, implement a Binary Search Tree (BST), and perform various tree traversals, especially level-order traversal using queues.

The session emphasized hands-on creation of trees from scratch and understanding recursive and iterative traversals.

Day 15 – (16-07-2025)

On the fifteenth day, students were introduced to Greedy Algorithms, a problem-solving strategy used to build solutions step-by-step by always choosing the locally optimal choice. Real-world examples like Activity Selection, Job Sequencing for maximum profit, and Huffman Encoding were explained and implemented.

Each problem was broken down with dry-run walkthroughs to help students understand the greedy logic behind it.

Day 16 – (17-07-2025)

On the sixteenth day, the session introduced students to Dynamic Programming (DP) — a powerful optimization technique for solving problems involving overlapping subproblems and optimal substructure. The concepts of Memoization (Top-Down) and Tabulation (Bottom-Up) were explained in depth with relatable examples. Classic DP problems like Coin Change and 0/1 Knapsack were practiced using both 1D and 2D DP arrays. Students also created visual DP tables to better understand state transitions.

Day 17 – (18-07-2025)

The seventeenth and final day of the training concentrated on advanced Dynamic Programming (DP) topics, including subset-based DP, string-based DP, Longest Increasing Subsequence (LIS), and Matrix Chain Multiplication (MCM). Students participated in a LeetCode-style contest with time-bound problems and later engaged in detailed solution walkthroughs for better concept clarity.

Day 18 – (19-07-2025)

On the eighteenth day, the session transitioned into advanced dynamic programming involving tree-based DP, state compression, and an intro to bitmasking techniques. Students collaboratively explored solutions through peer code reviews and deep-dived into optimal implementations,

strengthening both conceptual understanding and coding efficiency.

Day 19 – (21-07-2025)

On the nineteenth day, the session transitioned into advanced dynamic programming involving tree-based DP, state compression, and an intro to bitmasking techniques. Students collaboratively explored solutions through peer code reviews and deep-dived into optimal implementations, strengthening both conceptual understanding and coding efficiency.

Day 20 – (22-07-2025)

On the twentieth day, the session transitioned into advanced dynamic programming involving tree-based DP, state compression, and an intro to bitmasking techniques. Students collaboratively explored solutions through peer code reviews and deep-dived into optimal implementations, strengthening both conceptual understanding and coding efficiency.

Day 21 – (23-07-2025)

The trainer conducted intermediated level test in Python with Data Structure Algorithms concept on 22nd July 2025. The Python training program successfully equipped students with strong foundational and advanced programming skills essential for placement readiness. Through a well-structured day-wise approach, learners explored core concepts, data structures, algorithms, object-oriented programming, and real-world problem-solving.

SOFT SKILLS TRAINING

Department of AI-DS organized Soft Skills Training for BE students to enhance interpersonal, communication, and professional behaviour skills essential for personal and career success, by developing the ability to work effectively in teams, communicate clearly, manage time, adapt to workplace dynamics, and demonstrate leadership, empathy, and problem-solving capabilities from 24th – 26th July 2025.

Soft Skills Training conducted by Mrs. Munira Qamri on 24th July 2025.

Day 1 – (24-07-2025)

A Soft Skills Training session was conducted by **Mrs. Munira Qamri,** focusing on enhancing students' communication, presentation, and career readiness skills. The day began with fun team games to build coordination and collaboration. Students then learned about resume building, including structure, formatting, and common mistakes to avoid. The importance of a professional LinkedIn profile was discussed, with tips on maintaining an impactful online

presence. Engaging puzzles and brain teasers were also played to boost logical thinking and problem-solving abilities. The session was interactive and helped students prepare both personally and professionally for placement and career growth.

Day 2 – (25-07-2025)

Mrs. Munira Quamri, began with an interactive "Guess the Movie Name" game played between two teams to build engagement and teamwork. This was followed by a discussion on the importance of good communication skills in professional and personal life. Students were divided into four teams for a group listening activity, where each team listened to an audio clip and collaboratively prepared a summary, which was then presented in front of the class. In the afternoon, students learned how to conduct a good group discussion (GD) with the help of a sample video demonstration, after which a live GD session was conducted for 10 minutes per team. The session helped enhance active listening, speaking clarity, teamwork, and public speaking skills. Topics for GD where offline education vs online education, is social media good or bad, Computation of Uniform is important or not.

Day 3 – (26-07-2025)

Trainer focused on enhancing students' communication and presentation skills for interviews and professional settings. The session began with a recap of parts of speech (e.g., identifying nouns, verbs, adjectives in sample sentences) to improve sentence formation and clarity. Students learned about non-verbal communication such as dressing style (e.g., wearing formal attire for interviews), body posture (e.g., sitting straight, maintaining eye contact), and the impact of gestures and facial expressions. Key do's and don'ts in interviews were discussed — for example, "Do greet the interviewer with a smile" and "Don't interrupt mid-question." Common interview questions like "Tell me about yourself" and "What are your strengths and weaknesses?" were practiced with tips on answering confidently. A written activity involved giving opinions on topics like "Should social media be used in hiring?" to practice organizing thoughts. Finally, the session covered speaking style, encouraging students to use a clear voice, polite tone, and confident delivery, preparing them to leave a positive impression in real interviews.

The Soft Skills Training session, aimed to enhance students' English language usage, comprehension, and expression. The trainer conducted grammar correction exercises like Sentence Correction and Para Jumbles, where students practiced rearranging jumbled sentences to form logical paragraphs. A final group activity involved reading a news cutout, summarizing its content in writing, and then presenting the summary in front of the class.

TNSIF Training

CAMPUS TO CORPORATE CAREERS PROGRAM

TNS India Foundation(TNSIF) has developed a Campus to Corporate Careers Program which aims to usher under-resourced college-going youth into the formal workforce by upskilling them in 21-century, advanced technical, digital and industrial skills and thereby unlocking their economic potential. This intervention dramatically affects the lives of the students, their families and community by helping them break out of the poverty cycle.

The program includes components on Career Readiness (strengthening job-readiness by rigorous training), Career Counselling (developing student orientation towards corporate careers), Career Access (supporting youth to enter high-potential corporate careers), and Wrap-around support (like alumni and parent engagements to enable holistic progress, remedial classes and up to one year of post-placement support).

Mr. Noel Fernandez, Trainer, TNSIF, Pune started Soft Skill Session from 24th June to 2nd July 2025. Introduction about training importance for placement and why Soft Skills training?

Soft-skill training is essential for success—both at work and in life. It equips individuals with vital personal and interpersonal abilities like communication, teamwork, empathy, problem solving, and adaptability keys to thriving in any environment.

Training covered following concepts

- Enhance Interpersonal Effectiveness Improve communication and collaboration: Soft skills like active listening, clarity in expression, and teamwork reduce misunderstandings, build trust, and strengthen workplace relationships.
- Boost Individual & Team Productivity Time management and organization: Prioritizing tasks and managing time efficiently enhances output and work-life balance. Problem –solving and decision-making: Encouraging critical thinking, creative solutions, and resilience helps individuals tackle complex challenges effectively.
- Enable Career Growth & Leadership Support career advancement: Strong soft skills make candidates more promotable and leadership-ready, as they can influence, inspire, and mentor others.
- Create Positive Work Culture & Customer Experiences Build a healthy workplace: Soft skills foster collaboration, mutual respect, and conflict resolution, boosting morale and retention.
- Improve Time & Project Management Plan, prioritize, and manage multiple deadlines to ensure successful project delivery. Strengthen organizational skills to handle client engagements, lab work, and coursework effectively.

Glimpses of TNSIF Soft Skills Training:

Mr. Noel Fernandez, Trainer, TNSIF, Pune, accompanied Soft Skills Training for BE Computer and AI-DS students from 24th June to 2nd July 2025.

JAVA PROGRMING TRAINING BY TNSIF

Mr. Shubham Dhangar, TNSIF, Pune started Java Programing Training from 20th June to 16th July 2025.

The trainers taught strong foundational and practical Java programming skills in students, enabling them to solve real-world problems, build object-oriented applications, and confidently face coding interviews and placement assessments. Understand OOP principles, control structures, arrays, strings, exception handling, & file I/O. Java Programming Training is conducted both online and offline.

Glimpses - TNSIF Java Programming Training:

Training strength to equip students with strong Java programming skills and prepare them for technical interviews and coding assessments in campus placements and IT job drives.

IBM Training

CLOUD AND DATA ANALYTICS

IBM, a global leader in technology and consulting, regularly collaborates with academic institutions to bridge the gap between classroom learning and industry requirements. The IBM training program for TE students aims to equip them with industry-relevant skills and hands-on experience in following concepts:

- Deep Dive into AI/ML with IBM Watson
- IBM Cloud and DevOps Tools
- Internet of Things (IoT) using IBM Node-RED
- Data Analytics using IBM Cognos and SPSS

The training was conducted over two days, organized by the Department of Computer Engineering and AI-DS on 30th and 31st July 2025.

Glimpses – IBM Training

Webinar

PROCESS OF ADMISSIONC & AUTONOMOUS INSTITUTE ADVANTAGES

DYPCOEI, Varale campus organized Webinar & Discussion with Engineering Admission 2025-26 on 16th July 2025.

Eminent speakers **Prof. (Dr.) Suresh Mali,** Principal DYPCOEI, **Prof. (Dr.) Dipannita D. Mondal,** IQAC Coordinator & Head, Department of AI-DS, **Mr. Yogesh Nagvekar,** Head, First Year B.Tech and **Mr. Ravindra Daspute,** Dean Examination.

Speakers were discussed below points on Webinar:

- Process of Admission?
- Data Science & Machine Learning?
- Autonomous Institute Advantages?
- Eligibility Criteria?
- Fee structure?
- Exam Schemes?

Webinar created high impact on Admission Process, Autonomous Institute advantage and DS & ML branch importance on 16th July 2025.

Project Presentation

PROJECT TITLE FINALIZATION

Department of Computer Engineering arranged project presentation by project co-ordinators **Mrs. Abha Pathak, Mr. Vishal Borate** and **Mr. Sagar Dhanake** for BE students on 25th and 26th July 2025.

The session began with a brief explanation of the importance of a well-defined project title. Students were informed that a good title should be clear, concise, relevant, and convey the essence of the project.

BE students presented their project, Project Co-ordinators and faculty members asked doubts and suggested changes to include in their project.

Each group finalized one project title that scored the highest in evaluation and reflected the project's goals accurately.

BE Computer Engineering Students Project presentation on 25th and 26th July 2025.

All groups successfully finalized their project titles. Students gained clarity on the importance of precise and technical wording in titles.

Seminar Presentation

SEMINAR TOPIC FINALIZATION

Department of Computer Engineering arranged Seminar presentation by seminar co-ordinators **Mrs. Anita Shinkar, Mr. Sunil Kumar Yadav** and **Mr. Laxmikant Malphedwar** for TE students on 26th July 2025.

The objective of the session was to guide students in selecting appropriate, relevant, and innovative topics for their upcoming seminar presentations. The session aimed to ensure that the chosen topics align with current trends, subject relevance, and the students' area of interest. TE students presented their seminar, Seminar Co-ordinators and faculty members engaged the session.

- All TE students finalized their seminar topics successfully
- Students gained a better understanding of topic relevance, scope narrowing, and alignment with current trends
- Faculty provided valuable suggestions to improve topic depth and focus

TE Computer Engineering Students Seminar presentation on 26th July 2025.

CEP Presentation

COMMUNITY ENGAGEMENT PROJECT – SE (AI-DS)

Department of AI-DS arranged Community Engagement Project presentation by CEP co-ordinator **Mr. Ashutosh Chandgude** and Mentor **Ms. Mayure Fegadeikant** for SE students on 26th July 2025.

The aim of the presentation was to showcase the planning, execution, outcomes, and impact of the Community Engagement Project undertaken by students. This activity provided experiential learning through real-life community interaction and problem-solving.

SE students presented their CEP, CEO Co-ordinator, Mentor and faculty members engaged the session.

- Students gained hands-on experience in social impact projects
- Community responded positively to the efforts
- Project scope for long-term sustainability or future engagement identified

SE (AI-DS) Students CEP presentation on 26th July 2025

Exploring Engineering Excellence - DADB

GERMAN ACADEMY OF DIGITAL EDUCATION

Bridge the gap between academic knowledge and industry needs by offering high-quality, practice-oriented online courses in sustainable technologies and industrial innovation. Department of Computer Engineering organized session on **"Exploring Engineering Excellence"** by DADB (German Academy of Digital Education) on 26th July 2025.

Program started with inauguration ceremony. Session guest Mrs. Pooja Sinha, Regional Hub Manager, DADB India [Heartfulness Trainer], Mr. Akhilesh Rakshe, Business Partnership Maneger, Mr. Atul Rao, Trainner was felicitated by Honourable Prof. (Dr.) Suresh Mali, Principal DYPCOEI, Prof. (Dr.) Alpana Adsul, Head, Computer Engineering, Prof. (Dr.) Dipannita. D. Mondal, Head, AI-DS and department faculties were present for a program. This program was organized for TE and BE students.

DADB (German Academy of Digital Education) is a private, Germany-based online education provider founded in 2020. It specializes in university-level, practice-oriented courses in advanced and sustainable technologies like 5G/6G, Solar Electric Systems, Hydrogen, IoT, Wind power, and Electro Mobility.

German Academy of Digital Education appears to be an educational or training institution possibly collaborating with DADB for skill development programs. While it may not be widely known or officially affiliated with the German government, it often runs **certified online/offline courses**, workshops, and events under the DADB umbrella.

Mr. Akhilesh Rakshe, Business Partnership Manager, DADB and Mrs. Pooja Sinha, Regional Hub Manager, DADB India Heartfulness Trainer interacted with TE and BE students on 26th July 2025.

DADB empowering youth through **Digital Education** Providing training in AI, Data Science, Cybersecurity, IoT and other futuristic domains.

DYPCOEI faculty members, DADB Team along with student volunteers on 26th July 2025.

Showcase

WORLD YOUTH SKILL DAY

DYPCOEI, Varale campus presenting the DYP Cultural Center organized World Youth Skill Day on 15th July 2025. Prof. (Dr.) Suresh Mali, Principal DYPCOEI inaugurated DYP Cultural Center.

World Youth Skills Day is observed every year on **July 15**. It was declared by the **United Nations General Assembly (UNGA)** in **2014** to raise awareness about the importance of equipping young people with **skills.**

DYP Cultural Center created opportunity to showcase student's talent like dance, music, drama, poetry and stand-up comedy.

Glimpses of Showcase:

Workshop - SPPU

WOMEN EMPOWERMENT & CAPACITY BUILDING

The **SPPU** sponsored workshop on **"Women Empowerment and Capacity Building (WE & CB)"** was organized by department of computer engineering with the aim of spreading awareness about women's rights, laws, and personal development. The session focused on empowering women through knowledge sharing and inspiring interactions on 15th July 2025. One of the key highlights of the workshop was the motivational talk delivered by **Ms. Megha Punia,** Wing Commander (Retired) and Director – People Partner, Governance & Risk Regulatory.

She encouraged all the girls by sharing her powerful life journey and experiences. Through her stories, she illustrated how gaining confidence became the turning point in her life, enabling her to achieve success and overcome various challenges. Her speech was both inspiring and insightful, leaving a lasting impact on the participants and motivating them to believe in themselves, dream big, and pursue their goals with courage and determination.

The workshop also featured an insightful session by **Adv. Arundhati Mandlik,** a practicing advocate with a BSL LLB degree. She addressed the participants on the importance of legal awareness and understanding the rights and protections available to women under the law. Her session focused on empowering women through legal knowledge, explaining various laws related to women's safety, workplace rights, and social justice. With her expertise and clear communication, she simplified complex legal topics and encouraged the attendees to be aware of their rights and to speak up against injustice. Her informative and thought-provoking talk helped the participants gain a stronger sense of legal empowerment and confidence in standing up for themselves and others in society.

Glimpses – Workshop on "WE & CB":

Quotes of the Month