R&D Collaborations & Engagements

Research Centre: Civil Engineering

1. List of MoU with Industries

MoU for Research : 28

Sr No.	MOU Partner	Description of MoU	Duration	Type of MOU
1	Pathak Consultant	Research Collaboration	5 Year	**Industrial**
2	CHAC united	Research Collaboration.	5 Year	**Industrial**
3	Dimenssion 5, vastumitra(govid nagar), thete nagar, gangapur road	Research Collaboration	5 Year	**Industrial**
4	Pioneer construction,	Research Collaboration	5 Year	**Industrial**
5	Kimaya Steel, Dindori	Research Collaboration	5 Year	**Industrial**
6	Sathe Builders and Developers	Research Collaboration	5 Year	**Industrial**
7	ABL Infra , Nashik	Research Collaboration.	5 Year	**Industrial**
8	DK Design and Consultancy	Research Collaboration	5 Year	**Industrial**
9	Hembade Builders and Developers	Research Collaboration	5 Year	**Industrial**
10	Civil Tech Testing Lab	Research Collaboration	5 Year	**Industrial**
11	Vinit Construction	Research Collaboration	5 Year	**Industrial**
12	Shritej Construction	Research Collaboration.	5 Year	**Industrial**
13	J J MEP Consultant	Research Collaboration	5 Year	**Industrial**
14	i-Valuers Advisory LLP	Research Collaboration	5 Year	**Industrial**
15	MM Precise Construction	Research Collaboration	5 Year	**Industrial**
16	SteelDlink Nashik	Research Collaboration	5 Year	**Industrial**
17	Infinite graphix Technologies Pvt. ltd	Research Collaboration.	5 Year	**Industrial**
18	Ellora Engineering Procurement Construction (EPC) Pvt Ltd	Research Collaboration	5 Year	**Industrial**
19	AjinkyaTara Consultant	Research Collaboration	5 Year	**Industrial**
20	Prothoius Nashik	Research Collaboration	5 Year	**Industrial**
21	Geocon Constultant	Research Collaboration	5 Year	**Industrial**
22	Soil glob Engg pvt ltd.	Research Collaboration.	5 Year	**Industrial**
23	Centrix Engineering Solution Pvt. Ltd.	Research Collaboration	5 Year	**Industrial**
24	Hire and Jagtap Constructions	Research Collaboration	5 Year	**Industrial**
25	Aditya Associates Engineers and Contractors	Research Collaboration	5 Year	**Industrial**
26	Aashwatth Growth Private Limited: Flat no.	Research Collaboration	5 Year	**Industrial**
27	Aarohi Associates	Research Collaboration.	5 Year	**Industrial**
28	**Suyash Construwell Private Limited**	**Research Collaboration**	**5 Year**	**Industrial**

2. Industry Support Laboratories

The department has signed the MoU with different industries with the objective to bridge the gap between industry and academics by providing the training to the faculty and the students. The industry has also supported the institute by developing the laboratories in campus.

The laboratory developed is 3D Printing Technology in collaboration with 3D Printing ANET 3D Printer.

3D Printing Laboratory by ANET 3D Printer:-

a) Type of industry

- Today, 3D printing is rapidly evolving with new players entering the field, more patents expiring, new technologies (e.g., CLIP and Multi-Jet Fusion) being developed, and supporting software catching up. It's estimated that the market will grow to $20 billion by 2025.
- In terms of 3D printing of object, three processes have become popular. The first is called fused deposition modelling (FDM). It uses a thermoplastic filament, which is heated to its melting point and then extruded, layer by layer, to create a three-dimensional object. This rather slow process supports acrylonitrile butadiene styrene (ABS) and polylactic acid (PLA) types of materials.
- Idea Technology LLP is a service provider and supplier of highly affordable 3D Printers, Hand Held 3D Scanners, 3D Pens, Printing Materials, 3D Printing Curriculum & 3D printing Services across India.

b) Type of Laboratory :

1. To provide 3D printing training to University students to enhance skill sets as per Industry requirement. i.e.to provide platform for
   construction of a three-dimensional object from a CAD model or a digital 3D Model with material being added together typically layer by layer.
2. Highlight points of training are mentioned below:

- 3D printing slicers software
- 3D printer components, identification, usage
- Machine Operating
- Usage of 3D printing services
- Live Demo of 3Dprinters

	MOU Partner	Description of MoU	Duration	Date	Type of MOU
1	MET's Institute of Engineering, Nashik	Research Collaboration	5 Year	01/08/2021	Academic
2	KK Wagh Institute of Engineering Education and Research	Research Collaboration	7 years	01/08/2016	Academic

Research Centre: Electronics & Telecommunications

1. List of MoUs with Industries

MoU for Research/ Apprenticeship Collaboration : 38

	MOU Partner	Description of MoU	Duration	Date	Type of MOU
1.	**E-Cube Home Solutions**, Shanti nagar Vakil Wadi, Ashok Stumbh Nashik 422001	Research Collaboration	5 Year	01/01/2022	Industrial
2.	**Calibers Infotech Pvt. Ltd.** , Second Floor, Prakash Apartment, Near ABB Circle mahatma Naggar, Nashik-422007	Research Collaboration	5 Year	01/08/2022	Industrial
3.	**Yashaswi Electronics**, Shop No. 06, Trimbakeshwar Apartment Raikar nagar, Pune 411041	Research Collaboration	5 Year	24/08/2022	Industrial
4.	**ESDS Software Solutions,** Limited Plot No. B-24&25, NICE Industrial Area, Satpur MIDC, Nashik 422007	Research Collaboration	3 Year	21/09/2022	Industrial
5.	**Apuriweb Technologies,** Nashik Maharashtra-422002	Research Collaboration	2 Year	01/07/2024	Industrial
6.	**Ascesion Innovation Pvt. Ltd.,** Gla nO. 29, Akanksha 2, NICE Industrial Area, Satpur MIDC, Nashik 422007	Research Collaboration	2 Year	15/7/2024	Industrial
7.	**Sivananda Electronics,** Dipak Mahal, Lam road, Devlali, Nashik Maharashta 422401	Research Collaboration	2 Year	16/08/2024	Industrial
8.	**Webfries IT Soutions Private Limited, Gurgaon Haaryana**	Research Collaboration	3 Year	19/09/2024	Industrial

2. Industry Support Laboratories

The Department of Electronics and Telecommunication Engineering has signed MoUs with different industries with the objective of bridging the gap between industry and academics by providing advanced technical training to faculty members and students. The industries have also supported the institute by developing specialized laboratories on campus to enhance practical exposure and industry-oriented learning.

The laboratories developed in collaboration with various industries are as follows:

1) Embedded Development Kits Laboratory by Yashaswi Electronics, Pune

a) Type of Industry

- Yashaswi Electronics, Pune is engaged in the manufacturing of embedded systems, digital trainers, microwave benches, DSP kits, microprocessor kits, and microcontroller-based development systems.
- The company provides innovative educational and industrial training solutions in the field of embedded systems and electronics engineering.
- It supports engineering institutes by supplying advanced development kits and training modules for hands-on learning in embedded technologies.

b) Type of Laboratory

- To provide practical training to students in embedded systems and microcontroller-based applications as per industry requirements.
- To provide a platform for designing, programming, interfacing, and testing embedded hardware and software systems.
- Highlight points of training are mentioned below:
  - Embedded C programming
  - Microcontroller interfacing techniques
  - Sensor and actuator interfacing
  - Digital trainer kit operation
  - Development and testing of embedded system projects
  - Real-time hardware implementation

c) Objective & Utilization

- Used to build and test projects based on embedded systems.
- Used for conducting practical sessions related to microprocessors, microcontrollers, and embedded systems.
- Supports mini-projects and final-year projects.
- Utilized by TE and BE classes.

2) VLSI Design and Development Laboratory by CYPRESS Semi Tech. Ltd.

a) Type of Industry

- CYPRESS Semi Tech. Ltd. provides high-quality, value-driven embedded and VLSI solutions with world-class technical support.
- The company works in the field of semiconductor technology, embedded solutions, and VLSI system design.
- It focuses on advanced chip design technologies and electronic system development.

b) Type of Laboratory

- To provide hands-on training in VLSI design, simulation, and implementation techniques.
- To provide students with exposure to modern semiconductor design tools and methodologies used in industries.
- Highlight points of training are mentioned below:
  - VLSI circuit design

- FPGA and ASIC concepts
- HDL programming using Verilog/VHDL
- Simulation and verification techniques
- Analog and digital IC design
- Communication circuit implementation

c) Objective & Utilization

- Allows students to design and implement VLSI circuits.
- Used for VLSI and Communication practical sessions.
- Used to build and test VLSI and analog circuit-based projects.
- Supports research activities and project development.
- Utilized by TE and BE classes.

3) Analog Circuit Development Laboratory by Texas Instruments

a) Type of Industry

- Texas Instruments is a globally recognized semiconductor manufacturing company that designs and manufactures analog integrated circuits and embedded processors.
- The company serves customers worldwide in industrial, automotive, communication, and consumer electronics sectors.
- Texas Instruments provides innovative solutions for analog circuit design and embedded applications.

b) Type of Laboratory

- To provide practical exposure in designing and testing analog electronic circuits using modern components and development tools.
- To enhance students' understanding of analog electronics and real-time circuit implementation techniques.
- Highlight points of training are mentioned below:
  - Analog circuit design and analysis
  - Operational amplifier applications
  - Signal conditioning circuits
  - PCB designing and testing
  - Measurement and troubleshooting techniques
  - Mini-project and prototype development

c) Objective & Utilization

- Allows students to design and implement various analog circuits.
- Used for mini-projects and final-year projects.
- Used for practical sessions in analog electronics and communication subjects.
- Enhances industry-oriented practical knowledge among students.

Research Centre: Electrical Engineering

1. List of MoU with Industries

MoU for Research : 08

2. Industry Support Laboratories

	MOU Partner	Description of MoU	Duration	Date	Type of MOU
1	Simpower Technology Nashik	Research Collaboration	5 Year	22/01/2026	Industrial
2	Autotech Nashik	Research Collaboration.	5 Year	02/02/2026	Industrial
3	Slidewell Milluer Pvt Ltd Nashik	Research Collaboration	5 Year	23/03/2026	Industrial
4	JJ MEP Pvt Ltd Nashik	Research Collaboration	5 Year	22/12/2025	Industrial
5	MAHADISCOM Training Centre Eklahare Nashik	Research Collaboration	5 Year	29/01/2026	Industrial
6	Salunke Automation Pvt Ltd	Research Collaboration	5 Year	20/03/2026	Industrial
7	Wattson Pvt Ltd Nashik	Research Collaboration	5 Year	20/03/2026	Industrial
8	Nashik Transformer Pvt Ltd	Research Collaboration	5 Year	22/01/2026	Industrial

- **Industry Collaboration Report: Autotech Pvt Ltd Nashik**

- **About the Industry:**
  Autotech Nashik is an industry-oriented organization specializing in electrical automation and control systems. It focuses on providing practical training and project exposure in PLC and SCADA technologies. The company bridges the gap between academic learning and industrial requirements by offering hands-on experience with real-time systems. It operates with a vision to develop skilled engineers ready for automation industries.

- **Services Offered by the Industry:**
  Autotech Nashik provides training programs on PLC, SCADA, HMI, and industrial automation systems. It also undertakes industry-based projects, consultancy services, and technical workshops for students and professionals. The organization offers real-time simulation, panel design practices, and troubleshooting sessions, helping learners understand industrial applications. Additionally, it supports customized training modules as per industry demands.

- **Benefits to Students:**
  Students gain practical exposure to automation tools and technologies widely used in industries. The collaboration enhances their technical skills, problem-solving abilities, and employability in core sectors. It also provides opportunities for live projects, internships, and industry interaction, improving confidence and job readiness. Overall, students become better prepared for careers in automation, manufacturing, and process industries.

- Equipments:

1. Trainer Kit for PLC basics
2. Working kit for Sensors I/O
3. Software ZeloSoft for interfacing

Research Centre: Mechanical Engineering

1. List of MoU with Industries

MoU for Research : 05

	MOU Partner	Description of MoU	Duration	Date	Type of MOU
1	MET's Institute of Engineering, Nashik	Research Collaboration	5 Year	01/08/2021	**Academic**
2	InvensysCAD Solutions, Nashik.	Research Collaboration	5 Year	08/01/2022	**Industrial**
3	SNJB's Late Sau KBJ College of Engineering, Chandwad.	Research Collaboration	5 Year	05/05/2022	**Academic**
4	FALCON Automation	Research Collaboration	3 Year	05/06/2023	**Industrial**
5	Satish Injectoplast Pvt. Ltd., Nashik.	Research Collaboration	1 Year	01/08/2024	**Industrial**

2. Industry Support Laboratories

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The laboratory developed is 3D Printing Technology in collaboration with 3D Printing Shenzhen Technology Co. Limited, China.

3D Printing Laboratory by Shenzhen Technology Co. Limited, China:-

c) Type of industry

- Today, 3D printing is rapidly evolving with new players entering the field, more patents expiring, new technologies (e.g., CLIP and Multi-Jet Fusion) being developed, and supporting software catching up. It's estimated that the market will grow to $20 billion by 2025.
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d) Type of Laboratory :

3. To provide 3D Printing training to University students to enhance skill sets as per Industry requirement. i.e.to provide platform for
   construction of a three-dimensional object from a CAD model or a digital 3D Model with material being added together typically layer by layer.

4. Highlight points of training are mentioned below:

- 3D printing slicers software
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