FORCE 2022

Volume-II

Department Newsletter



DEPARTMENT OF MECHANICAL ENGINEERING

SAI VIDYA INSTITUTE OF TECHNOLOGY



(Affiliated to VTU ,Approved by AICTE, Accredited by NBA, New Delhi,, Recognized by Govt. of Karnataka)

NBA Accredited (ECE, CSE, ISE, Mechanical, Civil)

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Editorial Members

Chief Editor: Dr. Raghavendra S-

Editorial Board Member: Mr. Vijaya B

Student Members:

- 1. Siddhartha J (1VA19ME016)
- 2. Rajesh.S (1VA19ME010)
- 3. Sai Charan L (1VA19ME012)
- 4. Vijay kumar S (1VA18ME028)
- 5. Shreyas H L (1VA18ME026)
- 6. Shashwath R Shetty (1VA18ME025)





Sri Sai Vidya Vikas Shikshana Samithi ® SAI VIDYA INSTITUTE OF TECHNOLOG

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lission

LEARN TO LEAD

Contribute dedicated, skilled, intelligent engineers and business administrators to architect strong India and the world.

To impart quality technical education and higher moral ethics associated with skilled training to suit the modern day technology with innovative concepts, so as to learn to lead the future with full confidence

Courses offered

Undergraduate Programs

- 1. BE in Electronics and Communication Engineering
- 2. BE in Computer Science and Engineering
- 3. BE in Computer Science and Engineering (Data Science)
- 4. BE in Computer Science and Engineering (AIML)
- 5. BE in Information science and Engineering
- 6. BE in Mechanical Engineering
- 7. BE in Civil Engineering

Postgraduate Programs

1. Master of Business Administration (MBA)

Message from Director





Prof. M.R. Holla Director

I am pleased to note that Department of Mechanical Engineering, SVIT is bringing out Department Newsletter for 2021-22. I appreciate the enthusiasm of magazine members of the Department who have contributed to the Newsletter. **Department** newsletter definitely provides a platform showcase the activities to and achievements of the students and staff such as: conferences attended by staff members and students, competitions won by students, innovative projects carried out by students with the guidance of staff, among others. I wish the students and staff of Department of Mechanical Engineering, all success

Message from Additional Director

Greetings to all the staff members, student friends, parents and other stake holders. I am delighted to present the newsletter of department of Mechanical Engineering. With core emphasize on academics, Department of Mechanical Engineering also motivates and nourishes students and staff members in co-curricular and extracurricular activates. The college standing by the spirit of its Vision had hosted many technical events to showcase the innovations of the young budding engineers. We continue to support the cause of contributing to the society and to the nation by providing a holistic growth to the students by imparting quality education and shaping their character through Induction Training programme



Dr. A M Padmareddy Additional Director

Message from Principal





I am extremely delighted that the Department of Mechanical Engineering is bringing out newsletter every year and this is an on-going process portraying the various Departmental activities. It is great to find a considerable number of achievements in academic and non-academic activities which certainly prove that our staff and students are adequately equipped and possess necessary skill-sets to bring laurels to the institution. I wish that this number may grow in the years to come. My Congratulations toMECH team.

> Dr Ramesh Babu H S Principal

<section-header>

I am delighted to release annual newsletter of Mechanical Engineering Department "FORCE" for the year 2021-22. During last year, various curricular and co-curricular activities were conducted successfully by the Department. Many Mechanical Engineering faculty members and Students have participated in various training programs and national/International conferences, which was the most encouraging factor; we want to continue this in the coming years also. Through periodic seminars, symposia, workshops, industrial visits and industrial training which are an integral part of the course, the students were equipped with technical knowledge, critical thinking skills and creativity to excel in the engineering profession. The Mechanical Engineering Department is committed to create a conducive atmosphere for the overall development of young brains into bright professionals of future. I believe, that in the years to come, armed with commitment and perseverance of the Mechanical Engineering Department faculty and staff, the department will continue to be the trend-setter in offering an array of curricular and co-curricular activities in order to achieve academic excellence

> Dr Raghavendra S Associate Professor and Head

Department of Mechanical Engineering

Vision

To establish Mechanical Engineering Department as an excellent centre to produce skilled and intelligent engineers as architects for a strong nation and the world.

Mission

- To impart quality technical education in Mechanical Engineering domain through an excellent teaching-learning environment.
- Instill ethical values among students to create technologically superior global man power through industry participation

PEOs

- PEO 1: Our graduates will be competent with strong fundamentals and sound knowledge in the field of Mechanical Engineering.
- PEO 2: Our graduates will practice and incorporate design, manufacture and carryout research activities to mould themselves as successful engineers.
- PEO3: Our graduates will process themselves personally and professionally in taking up state of the art technological challenges and pursuing leadership roles.

PSOs

- PSO 1: Characterize the performance of a Mechanical Component or a Mechanical System using computational tools.
- PSO 2: Design Mechanical Systems including drives, energy conversion systems, RAC and Fluid power systems as per specifications
- PSO 3: Select , plan and implement the process for manufacturing of Mechanical elements and for assembly of Mechanical Subsystems



- 1. Dr. Raghavendra S , M.Tech , PhD Associate Professor & HOD
- 2. Prof.Vijaya B, M.Tech, (PhD) Associate Professor
- 3. Prof. Santhosh S G, M.Tech, (PhD) Assistant Professor
- 4. Prof. Arjun S, M.Tech , (PhD) Assistant Professor
- 5. Prof. Arun R, M.Tech Assistant Professor
- 6. Prof. Mohan G, M.Tech, (PhD) Assistant Professor
- 7. Prof. Sanjay H M, M.Tech, (PhD) Assistant Professor
- 8. Prof. Ganesh C, M.Tech Assistant Professor



Advisory Board Members

Dr. H S Ramesh Babu

Principal, SVIT.

Dr. Raghavendra S

Assoc. Prof. & HOD, SVIT.

Mr. Vijaya B

Associate Professor, SVIT.

Mr Sridhar Ramakrishna

Director & General Manager - Tenneco power rain, Yelahanka, Bengaluru.

Mr. Govindray Bhat

Head -Quality AJAX Engineering Pvt Ltd, Doddaballapura.

Dr P Mahadeva Swamy

Prof & Head, Sapthagiri College of Engineering, Bengaluru.

Dr Niranjan Hiremath

Associate Prof & Head, REVA University, Bengaluru.

Mr. Alur Raghavendra

Promoter, Shree Krishna CNC Enterprises

Mr. Sourabh Dongre

Alumnae (2012-16 Batch)

Mr. Bharath S Alumnae (2013-17 Batch)

The Mechanical Engineering Department at SVIT was established in the year 2010 with an intake of 60 students. Mechanical Engineering is one of the most opted courses in engineering arena which has created ever standing demand as the graduates in this course are offered worldwide placement opportunities in Design and Manufacturing sectors of the Industries.

The department is headed by **Dr. Raghavendra S** along with a team of enthusiastic and well qualified teaching faculty members with an aboundant teaching experience.

The department has spacious and well equipped laboratories to cater the academic requirements of students as per the university curriculum. The department is emphasizing more on mini projects by students to impart more practical knowledge than they get out of their course of study. Periodically, workshops, seminars & technical symposia are organized in emerging trends of mechanical engineering to update student knowledge at par with today's industrial requirements. The department is organizing special training programs in mechanical engineering software like CATIA, ANSYS, and Pro-E etc. which helps to enhance and explore student skills in CAD/CAM/CAE discipline which is very essential in the present scenario of industries.





Industrial Visit to Suncasting



Industrial Visit to KGTTI



PROJECT EXHIBITION

Major objective of organizing this exhibition was to provide the platform and unleash the potential of the students by showcasing their innovative projects developed in the Final Year either as Industry Defined Problem or User Defined Problem and provide an opportunity for the students to demonstrate their learning experience

The outcome of the PROJECT EXHIBITION was that students were able to show their project at higher level and the process boosted their confidence





SI. No	Project Title	Position	Team Members	Guide
Department of Mechanical				
E.C.	Development of em control and perform improvement in 4s engine vaporised petrol	using 1	 Sharad Mukesh N Manoj Kumar Nithesh Singh 	Prof.Arjun S
2	Fabrication of Oil Skimme	r 2	 Sudarshan M Mekala saisomeshwar Md. sualaiman 	Prof.Sanjay H M
3	Development of Multipurg agricultural sprinkling rob	oose 3	 Darshan B M Aprameya Santhosh S 	Prof.Arun R
4	Biodegradable Pen	3	 Vijay Kumar S Deepak D Keshav Abhijith E Gagan Raj 	Dr. Raghavendra S









Students of AY 2018-22 Graduation Day held on 30th July 2022, Photograph with Director, Principal, and Teaching staff

BEST OUT GOING STUDENT OF THE YEAR FROM MECHANICAL ENGINEERING DEPARTMENT FOR THE ACADEMIC YEAR 2021-22



Best outgoing student of Mechanical branch was awarded to SHREYAS H L by Dr. Raghavendra.S, HOD, ME along with Proctor Prof. Mohan G

Placement Details



AJIT NEELMANI 1VA18ME001 LAB 2 MARKET



DEEPAK D 1VA18ME008 WIPRO



AKSHAY S 1VA18ME004 HI-Q Design





AKASH 1VA18ME002 HI-Q Design



DHARSHAVARDHAN REDDY 1VA18ME010 WIPRO



KESHAV ABHIJITH 1VA18ME013 ALTENER SOLUTION

Placement Details



SHREYAS H L 1VA18ME026 PLCM Pvt Ltd



SHASHWATH R 1VA18ME025 VERZEO



SHAMEETH S 1VA18ME023 HI-Q Design





VIJAY KUMAR S 1VA18ME028 HI-Q Design



M SAI SOMESHWAR 1VA18ME016 ALTENER SOLUTION



RAKESH ANGADI 1VA18ME021 PIN CLICK

Paintings Sketches & Photography





Mr. Shreyas H L 8th Sem Mechanical





Mr. Mukesh N 8th Sem Mechanical











Mr. Pavan Joshi 6th Sem Mechanical



Mr. Siddarth J 6th Sem Mechanical

















Mr. Amith Yashas 4th Sem Mechanical

PROGRAM OUTCOMES (POs)

- **PO1: Engineering knowledge**: Apply the knowledge of mathematics, science, engineering fundamentals, and an engineering specialization to the solution of complex engineering problems.
- **PO2: Problem analysis**: Identify, formulate, review research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences, and engineering sciences.
- **PO3: Design/development of solutions**: Design solutions for complex engineering problems and design system components or processes that meet the specified needs with appropriate consideration for the public health and safety, and the cultural, societal, and environmental considerations.
- **PO4: Conduct investigations of complex problems:** Use research-based knowledge and research methods including design of experiments, analysis and interpretation of data, and synthesis of the information to provide valid conclusions.
- **PO5: Modern tool usage**: Create, select, and apply appropriate techniques, resources and modern engineering and IT tools including prediction and modeling to complex engineering activities with an understanding of the limitations.
- **PO6:** The Engineer and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal and cultural issues and the consequent responsibilities relevant to the professional engineering practice.
- **PO7: Environment and sustainability**: Understand the impact of the professional engineering solutions in societal and environmental contexts, and demonstrate the knowledge of, and need for sustainable development.
- **PO8: Ethics**: Apply ethical principles and commit to professional ethics and responsibilities and norms of the engineering practice.
- **PO9:** Individual and team work: Function effectively as an individual, and as a member or leader in diverse teams, and in multidisciplinary settings.
- **PO10: Communication**: Communicate effectively on complex engineering activities with the engineering community and with society at large, such as, being able to comprehend and write effective reports and design documentation, make effective presentations, and give and receive clear instructions.
- **PO11: Project management and finance**: Demonstrate knowledge and understanding of the engineering and management principles and apply these to one's own work, as a member and leader in a team, to manage projects and in multidisciplinary environments.
- PO12: Life-long learning: Recognize the need for, and have the preparation and ability to engage in independent and life-long learning in the broadest context of technological change.



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