

Department of AI & ML



2023, Volume II, Issue I



VISION AND MISSION



To be identified as a Learning Centre in the domain of Artificial Intelligence and Machine Learning education that delivers competent and professional engineers to meet the needs of Industry, Society, and the Nation.

- To impart skill-based (Artificial Intelligence and Machine Learning) education through a competent teaching-learning process.
- To establish a Research, Innovation, and Start-up ecosystem that provides solutions for technological challenges of the industry, society, and the nation.



• To set up an industry-institute interface for the overall development of students through practical internship and teamwork activities.

DEPARTMENT PROFILE

The department was started in the year 2021 to offer under graduate degree programme i.e., Bachelor of Engineering (BE) in Artificial Intelligence and Machine Learning (CSE-AI&ML). AI&ML is a new and upcoming program in the area of computer science that is rapidly expanding its boundaries to variety of fields like healthcare, security, entertainment, education, autonomous transportation, intelligent robots, space exploration, speech processing, stock trading and many more. We have seen a lot of change in our lives because to artificial intelligence and its applications. AI aims to artificially imitate human intelligence in order to instil intelligence into robots. An application of AI called machine learning (ML) aims to give machines the ability to learn on their own. Numerous career opportunities have been produced as a result of AI and ML, which are significant drivers of the digital transformation. There is a huge demand for skilled engineers trained in these technologies.



PROGRAMME EDUCATIONAL OBJECTIVES (PEOS)

The graduates of BE-AIML program four years after graduation will

- 1. Implement Smart Intelligent Systems that cater to the needs of Industry and Society.
- 2.Enhance their skill set in the domain of Computer Science and Engineering to pursue Higher Education and Research.
- 3.Develop an Innovative and Entrepreneurial mindset to contribute towards building an "AtmaNirbharBharath".

PROGRAMME OUTCOMES (PO)

Engineering graduates in Computer Science and Engineering will be able to:

- 1. **Engineering knowledge:** Apply the knowledge of mathematics, science, engineering fundamentals and an engineering specialization to the solution of complex engineering problems.
- 2. **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.
- 3. **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.
- 4. **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.
- 5. **Modern tool usage:** Select/Create and apply appropriate techniques, resources and modern engineering and IT tools, including prediction and modelling to complex engineering activities, taking comprehensive cognizance of their limitations.
- 6. **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.
- 7. **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.
- 8. **Ethics:** Apply ethical principles and commit to professional ethics and responsibilities and norms of the relevant scientific and/or engineering practices.
- 9. **Individual and team work:** Function effectively as an individual and as a member or leader in diverse teams and in multidisciplinary settings.
- 10. **Communication:** Communicate effectively on complex engineering activities with the engineering community and with the 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.
- 11. **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.
- 12. Life-long learning: Recognize the need for and above have the preparation and ability to engage in independent and life-long learning in the broadcast context of technological changes.

PROGRAMME SPECIFIC OUTCOMES (PSO)

- 1. Intelligent Systems: Select appropriate technologies to analyse, design, implement, and deployment of smart and intelligent systems
- 2. **Contemporary Systems:** Design, and development of efficient IT solutions for challenging issues through experiential learning

DARPANA

HOD 'S MESSAGE



DR. BASAPPA B KODADA Associate Professor & HOD

We are happy to present the Department of Artificial Intelligence and Machine Learning's Newsletter, Volume 1, Issue 2, for the academic year 2022-23. This publication highlights the remarkable accomplishments and strides that our department's internal stakeholders have achieved in various dimensions. Our students have demonstrated exceptional talent and dedication by not only participating but also excelling in a range of national-level competition events. Their achievements stand as a testament to their abilities and commitment to excellence within the domain of AIML. We are immensely proud of their accomplishments of the Mini Projects in the 2nd year itself and look forward to witnessing their continued growth and success. Our faculty members have remained at the forefront of research and innovation. We take immense pride in the contributions they have made through publications in prestigious journals and conferences, participation in various online courses, and skill enhancement programs. These accomplishments not only enhance the department's reputation but also contribute to the advancement of knowledge in the fields of artificial intelligence and machine learning. Our journey has only just begun, and I am confident that with the collective efforts of our talented students, dedicated faculty members, and unwavering support from our esteemed colleagues, the Department of AIML will continue to achieve even greater heights in the years to come.



MR. NITHIN KURUP U G Assistant Professor

I'm delighted to present to you Darpana Volume 1, Issue 2. The academic, professional, and cultural activities of the Department of AIML at Canara Engineering College are comprehensively covered in this issue. I want to express my appreciation and sincere thanks to everyone who helped make this effort a success by saying so publicly. I want to express my sincere gratitude to the management for their assistance, encouragement, and support in this endeavor. I encourage suggestions from all of our readers who want to see their thoughts included in the upcoming issues. Please feel free to submit aiml@canaraengineering.in your comments and any relevant information with images to be included in our upcoming editions.



OUR FACULTIES & STAFF MEMBERS



DR. BASAPPA B KODADA ASSOCIATE PROFESSOR & HOD ASSISTANT PROFESSOR



MRS. KANMANI



MR.NITHIN KURUP U.G ASSISTANT PROFESSOR



MRS. SUPRIYA A V ASSISTANT PROFESSOR



MR.JAYAPRAKASH LAB INSTRUCTOR



MRS. SOWMYA D LAB INSTRUCTOR

STUDENT MEMBERS



MS. DEEKSHA DIVAKAR





MR. M RAHUL BHAT



MR. NAVEEN KUMAR



STUDENTS ACHIEVEMENT



AWARD WINNER



Rashmitha G (4CB21AI033)

Secured III place in 20KM Walking race held at VTU inter college state level Athletic meet 2022-23 PAGE 6

PARTICIPATION IN TECHNICAL

 Shreejal Anchan (4CB21AI062) attended training "Leadership camp on constitutional pillars of india" on 21/01/2023 at Ramakrishna Matha

• Madhushree (4CB21AI019) attended training "Education for empowerment" on 21/01/2023 at Ramakrishna Matha.

- Anoop Sadananda Prabhu K (4CB21AI004), M Akhila Prabhu (4CB21AI017), Sarthak Pramod Pai (4CB21AI036) and Kini Mehul Muralidhar (4CB21AI015) Participated online Compitition : E- Yantra Regional Conference" on 03/03/2023 conducted by IIT Bombay
- M Rahul Bhat (4CB21AI019) and Rashmitha G(4CB21AI033) Participated online Compitition : E- Yantra Regional Conference" on 19/02/2023
- Anoop Sadananda Prabhu K (4CB21AI004), M Akhila Prabhu (4CB21AI017), Sarthak Pramod Pai (4CB21AI036), and Vaidoorya Padiyar (4CB21AI057) attended project demo at Adhichunchana giri, Mandya.
- Sreejal Anchan (4CB21AI062) Participated in "Education of Empowerment" on 21/1/2023 at Ramakrishna Matha
- Anju Krishna (4CB21AI003), Deeksha Divakar (4CB21AI010) and Shreejal Anchan (4CB21AI062) participated in "Leadership camp on constitutional pillars of India" on 26/01/2023 organized by Alva's Education Foundation

DARPANA

DEPARTMENT ACTIVITIES

3 days Hands-on Session **"Internet of Things for Beginners"**

[11-01-2023 to 13-01-2023]



Day 1

Day 2





One day Hands-on Workshop

on 16-02-2023



A HANDS ON WORKSHOP















Internet of Things (IoT) On June 28, 2023 One-day mini-project exhibition





FACULTY ACHIEVEMENT

PUBLICATION

Mrs. Kanmani "Implementation of Biomedical Engineering Tools in Targeted Cancer Therapy: Challenges and Opportunities" Book title -Targeted Cancer Therapy in Biomedical Engineering-Springer-12 th April

RESOURCE PERSON



- Dr. Basappa B Kodada, Project Evaluator- Project Expo 2023 in SIT Valchil on 09-05-2023
- Dr. Basappa B Kodada , Mentor for Hackathon (State level IEEE Bangalore) in KLSGIT Belagavi on 30-04-2023
- Dr. Basappa B Kodada, Jury Member in Idea Conclave for better Mangalore Student for Development by Y20 on 02-05-2023



 Mrs. Kanmani A Handson Workshop using Arduino Board Sri Ramkunja Higher Primary Secondary School, Ramkunja 17-06-2023

PARTICIPATION IN FDP AND WORKSHOP



Dr. Basappa B Kodada ,"Webinar Institutional Effectiveness for Inclusive Excellence: A Strategic Roadmap for Future" at Canara College Mangalore on 02-07-2023



Mr. Nithin Kurup U G ," Inculcating Universal Human Values in Technical Education" from 20-02-2023 to 24-02-2023 AICTE, Delhi



Mrs. Supriya A V, "Inculcating Universal Human Values Education" from 20-02-2023 to 24-02-2023 AICTE, Delhi. in Technical



Mrs. Kanmani Webinar Institutional Effectiveness for Inclusive Excellence: A Strategic Roadmap for Future Canara College Mangalore on 02-07-2023



Mrs. Supriya A V," Research Training MSME-TECHNOLOGY DEVELOPMENT CENTRE (PPDC)" under Ministry of Micro, Small and Medium Enterprises from 27-02-2023 to 10-03-2023



Mr. Nithin Kurup U G, "Workshop Hands-on Python in ML" byKSTA- Webminar Park from 31-05-2023 to 5-06-2023



Mrs. Sowmya D, "Inculcating Universal Human Values in Technical Education" from 06-03-2023 to 10-03-2023 AICTE, Delhi.



Mrs. Sowmya D, "Inculcating Universal Human Values in Technical Education" from 06-03-2023 to 10-03-2023 AICTE, Delhi.