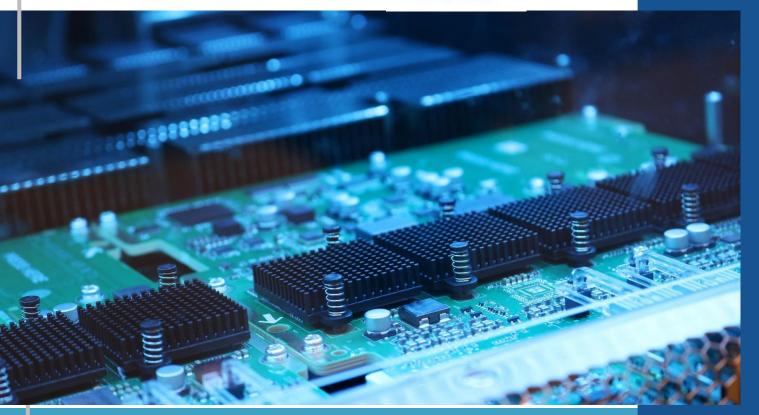
DEPARTMENT OF

COMPUTER SCIENCE AND ENGINEERING



TECHNICAL MAGAZINE

ACADEMIC YEAR: 2023-2024



WOMEN'S ENGINEERING COLLEGE







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CSE DEPARTMENT

Dear Readers,

It gives me immense pleasure to share the Achievement and activities of the Department of Computer Science and Engineering through this newsletter. Our department has always been at the forefront of innovation, research, and excellence in education.

The continuous support of our faculty, students, and stakeholders has been instrumental in achieving our goals.

Over the past semester, we have witnessed remarkable accomplishments in academic projects, technical advancements, and student-driven initiatives. Our focus on emerging technologies such as Artificial Intelligence, Machine Learning, Data Science, and Cyber security is preparing our students to excel in the competitive global environment.

I am proud of our students for their participation in hackthons, conferences, and internships, and I extend my heartfelt congratulations to them for their commendable efforts.

I also applaud our faculty members for their dedication to fostering a vibrant learning environment and for their contributions to cutting-edge research.

Looking ahead, we remain committed to creating an ecosystem that promotes holistic development, entrepreneurship, and lifelong learning. I encourage everyone to continue striving for excellence and contributing to the department's growth and success.

Best wishes,

Dr G Rama Swamy



BABY MONITORING SYSTEM

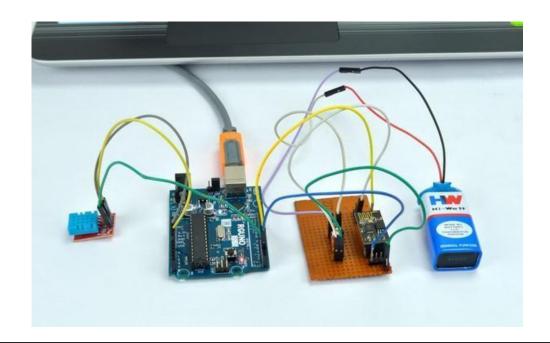
K.Anitha - 21KE1A0552, I. Anusha - 21KE1A0533, J. Jyothsna - 21KE1A0535

Mentor: Mrs.R.Akhila, Asst.Prof.

- The proposed system uses sensors to monitor important fetal parameters, such as ambient temperature, humidity and crying.
- A smart cradle system using IOT which helps the parents to monitor their child even if they are away from home and detect every activity of baby from any distant corner
- The technology used for this is internet of things which have modules like Arduino UNO temperature and humidity, servo motor, mic sensor.
- In order to detect each and every activity of the baby different sensors or modules attach to the cradle. Temperature and humidity Sensing module for detection of wetness of the bed

MIC sensor using to detect baby's crying.

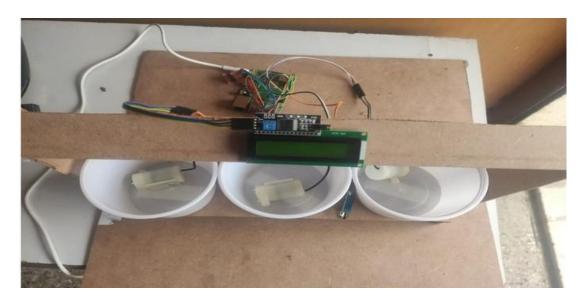
All the data which has been taken from the sensors will be stored in the cloud and then send to the user friendly web Application.



SPEECH BASED WATER DISPENSER

A.Sai surekha - 21KE1A0513, L.Gayathri - 22KE1A0557, M.Ramya -21KE1A0564

Mentor: Dr.K.Shiva Krishna, Prof.



- The device is designed to cater to people who are physically challenged and cannot operate the dispenser manually.
- The proposed system is based on a Raspberry Pi, a microphone, and a speaker. The system provides a cost- effective and convenient solution for people with physical disabilities to access hot and cold water.
- The objective of this project is to develop a speech-based water dispenser that can be operated using voice commands. The system's architecture includes a Raspberry Pi.
- The Raspberry Pi is programmed to recognize voice commands and sendsignals to the solenoid valves to dispense water of the desired temperature. proposed system's development includes the use of the Python programing language.



FETAL TRACKER

T.Ratna cheritha - 21KE1A05B6 , N.Bhavya Sri - 21KE1A05B3 , S.Deepthi - 21KE1A05B3

Mentor: Mr.A.Surrendra Babu, Asst.Prof.

- The proposed solution for daily monitoring of the fetus's growth involves an IoT-based smart baby monitoring system. This system consists of hardware and software components that allow for daily monitoring of the fetus's growth and development.
- It provides real-time data on size, position, and overall health, helping expectant parents professionals healthcare and track the progress of the pregnancy more closely. Using a smart baby monitoring system with provide efficient LCD can an an convenient way to monitor the growth of a fetus at home.
- •It allows for IoT-based connectivity, realtime monitoring, and a clear display of vital information this solution can help parents keep track of their baby's well-being easily.





CONTROLLED WIRELESS ARM

V.Sravani-21KE1A05C5, S.Sireesha -21KE1A05A8,

P.Divya - 21KE1A0590.

Mentor: Mrs.M.Sindhuja Asst.Prof.

An accelerometer is a device used to sense the acceleration of gravity of directions. This is used to command the robot to do the required tasks like moving forward, reverse, left, and right which is performed by hand movements, the other parts are controlled by Arduino in which the code is written.

These types of wireless robots are being developed and are used in a variety of applications and users. Robotic device not only helps humans to save time but also to increase productivity. The robotic arm is called a robot manipulator. In industry or any application, robot manipulators can be used for applications like welding, trimming; picking, etc.





COMMUNI SYSTEM FOR DDB

B.Kavya -20KE1A0508, Ch. Manasa - 20KE1A0510, D.Lahari - 20KE1A0522

Mentor: Dr.D.Ravi Kumar, Prof.



- •By harnessing the power of drone technology and advanced data analytics, the project seeks to address the challenges associated with traditional forest monitoring methods and enhance the efficiency and effectiveness of conservation efforts.
- •By employing drone swarms, the project aims to overcome the limitations of traditional monitoring methods and provide real time data on forest health, biodiversity and environmental conditions

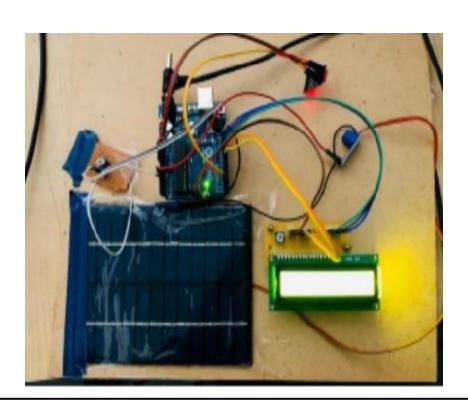


PREDICTIVE TECH

M.Sravani -20KE1A0561, S.Harshitha - 20KE1A05A1 Y.Geethika - 20KE1A05B4.

Mentor: Mr.B.Raja Krishna, Asst.Prof.

Implement a system to monitor industrial machinery using IoT sensors that collect real-time data. Utilize AI to predict equipment failures or maintenance needs, optimizing performance. Machine learning models analyze sensor data to identify potential automated breakdowns, while alerts notify personnel maintenance schedules. Additionally, AI evaluates equipment performance to provide optimization insights, ensuring smooth operations and reducing downtime, enhances equipment lifespan, and lowers maintenance costs, leading to overall improved productivity and reliability.







Tech Giants' Achievements



Google launched Gemini 2.0, Veo 2, Project Mariner, LearnLM, and NotebookLM, advancing AI and user interaction. LinkedIn introduced Recruiter 2024, LinkedIn Learning AI Coaching, and Accelerate for Campaign Manager, along with enhancing sales Navigator with AI tools. These developments significantly impacted AI and tech user experience



EMBRRCE DISITRL MINIMRLISM BY DECLUTTERINS ONLINE SPRCES RND FOCUSINSONINTENTIONRLTECH USE. AESTHETICMINIMRLISMHISHLISHTS SIMPLICITY AND FUNCTIONRLITY, USINS CLERN LINES RND NEUTRRL COLORS.BOTHARPPRORCHESENHRNC EMENTRLCLRRITY,PRODUCTIVITY, RND WELL- BEINS BY CRERTINS HRRMONIOUSRNDBRLRNCEDENVIRO NMENTSFREEFROMEXCESSRNDDISTRR CTIONS.AESTHETI MINIMRLISM ISRN ARPPRORCH.

LIFESTYLETHRTEMPHRSIZESSIMPLICI TY.



The Art and Essence of Digital and Aesthetic Minimalism

DEEPTHI SUDHA 2ND YEAR, CSE



"Self-love: because you deserve the love you give others."

"Treat yourself with kindness and watch your world transform beautifully."









A. Sri Kalyani 2nd Year, CSE

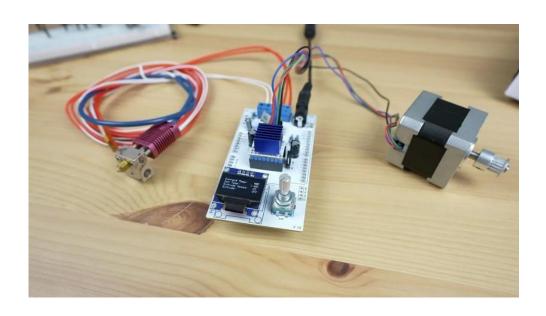


PET PULSE

M.Triveni Sai - 23KE1A05D9, M.Puja Bhavani - 20KE1A05E0, N.Sarvanni - 20KE1A05E9

Mentor: Dr.G.Ramaswamy, Prof.

Understanding pet reproductive cycles is crucial for responsible ownership and breeding. The image details the estrous cycles and behaviors of female cats and dogs, providing essential insights for pet owners to ensure proper care and health management of their pets. The solution we are proposing is that we made a wearable belt which measures the body temperature of pet's body and the total distance travelled by that pet . As we know that pets don't like to walk a lot in that time as compared to normal times, and the temperature of pets body increases as it releases heat. This belt also monitors the distance travelled by that pet as it also helps the owner to understand its health conditions also. It creates a strong bond between pets and their owners.





"Nurture the Light Within"

- In the quiet whisper of self-discovery's embrace, A love resides, a gentle strength, a calming grace. Each flaw, each mark, a brushstroke on life's grand design, A unique masterpiece, with colors that intertwine.
- Cherish the journey, the winding roads where wisdom grows, In these moments, true understanding flows. Let your inner light shine with unwavering might, Inspiring others, guiding them through the night.
- The most profound connection one can find, Is the love for oneself, both heart and mind. In this sacred space, where greatness begins, A story of self-love, where each chapter wins.







ServiceNow is a cloud-based platfform that streamlines IT service management, automates workfflows, and enhances business processes. It integrates AI-driven solutions ffor IT, HR, and enterprise services, improving effficiency and user experience





ORAL TECH DIAGNOSES

M.Sravani - 20KE1A0561, S.Harshitha - 20KE1A05A1, Y.Geethika - 20KE1A05B4.

Mentor: Mrs.K.M.L.Priyanka, Asst.Prof.



Traditional medical diagnoses include physical exams, blood tests, imaging Visual and scans. inspections, such as of the tongue, reveal health clues; blood tests detect disease markers; imaging scans like X- rays and MRIs provide detailed internal views. These combined methods help doctors accurately diagnose and treat patients.

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Pioneering
Space
Exploration:
Highlights off
ISRO's
Achievements





MALINENI LAKSHMAIAH WOMEN'S ENGINEERING COLLEGE





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