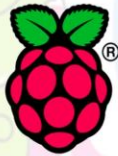


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Student Coordinators:

Mr.G.Saketh
Ms.V. Sri Hasitha
Mr.P.Komal VenkatSai
Ms.Ch.Naveena

Editors:

Dr.Sk.Sadulla. HOD-ECE
Mr.Maduguri Sudhir
Ms.Nuthalapati Soniya

KITS KKR & KSR INSTITUTE OF
TECHNOLOGY & SCIENCES



VISION, MISSION & PEO'S

Vision

Developing highly Qualitative, Technically Competent and Socially Responsible Engineers.



Mission

To provide quality education in the domain of Electronics and Communication Engineering through

- Enriched curriculum for addressing the needs of Industry.
- Effective teaching learning processes through congenial environment.
- Gaining contemporary knowledge through research, development, curricular, co and extra-curricular.



ECE Program Educational Objectives

Graduates of Electronics & Communication Engineering Shall

PEO1: Develop a strong background in basic science and mathematics and ability to use these tools in their chosen fields of specialization.

PEO2: Have the ability to demonstrate technical competence in the fields of electronics and communication engineering and develop solutions to the problems.

PEO3: Attain professional competence through life-long learning such as advanced degrees, professional registration, and other professional activities.

PEO4: Function effectively in a multi-disciplinary environment and individually, within a global, societal, and environmental context.

PEO5: Take individual responsibility and to work as a part of a team towards the fulfillment of both individual and organizational goals.

The institute is a symbol of egalitarian outlook without discretions. KITS student activity council is organized exclusively by students with representatives from various disciplines stands for the advocacy of democracy and leadership opportunities provided by the institute.. **KITS imparts Outcome Based Education (OBE)** which gives equal opportunities to teaching and learning curricular, co-curricular and extra-curricular activities

e-Yantra lab Initiative conducted a two day Teachers training workshop on 6th and 7th March in KITS College.

e-Yantra Innovation Challenge (formerly known as e-Yantra Ideas Competition) is a competition to encourage innovative projects from robotics labs set up through the e-Yantra Lab Setup Initiative (eLSI) in colleges across the world.

This initiative aims at:

- Ensure sustained use of robotics labs set up through the e-Yantra Lab Setup Initiative (eLSI).
- Solicit innovative ideas from students in eLSI colleges articulating solutions to real problems.
- Provide a platform for teams to showcase their projects.
- Encourage startup culture in e-Yantra Labs.



Electronics and Communication Engineering (ECE) graduates play a very important role in providing automated solutions such as disease surveillance, integrating sensor system in a smartphone for early detection of disease symptoms, sensor-based sanitizer dispensing system, etc. thereby, application of electronics, integration of sensors, wireless connectivity, and remote operability, etc. are the key requirements for this pandemic (COVID 19) equipment.

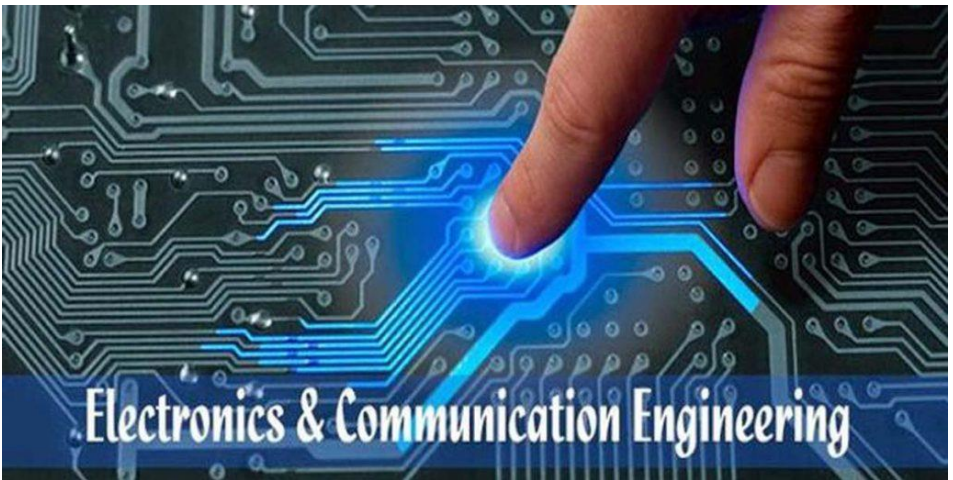
People with this specific knowledge have contributed, are contributing, and will continue contributing significantly in developing automatic technology in fighting against this kind of pandemic.

On March 11, 2020, the World Health Organization confirmed the Coronavirus as a pandemic. And soon many countries have enforced lockdown measures to stop the spread of this deadly disease. According to a survey, conducted by IPC (Institute for Printed Circuits), electronics manufacturers anticipate at least a five-week product shipment delay from suppliers due to the coronavirus epidemic. With these difficulties also, the engineers (ECE) have geared up in R & D activities in fighting against this pandemic and acting as a backbone to all the support staff (Doctors, Health workers, Administration staffs like Ministers,

Role of electronics and communication engineers in combat against COVID19



Even in today's highly medically advanced adept society, suppressing the virus has required extreme measures of isolation and social distancing. One of the most common ways of minimizing the spread of the disease in key public places has been to remotely record the temperature of people as they pass through designated zones. There are a number of different monitoring devices to record the temperature of the general public. Electronics engineers mostly prefer referring to use infrared waves to measure the temperature of the person/a group of people. Artificial Intelligence (AI), the Internet of Things (IoT), and deep learning methods are being used to accurately analyze the data to predict and monitor the spread of the disease across countries, the survival chance of patients and take the pressure off frontline radiologists. There are also many molecular diagnostic platforms in determining if a patient has been infected. In the communication part, today, satellite technology provides high-bandwidth, multi-media patient information to aid shared clinical decision-making and early diagnosis. Remote visual and telephone consultations help in many surgeries minimizing the spread of germs. The link allows two-way real-time consultation enabling seamless patient care.





What Is Artificial Intelligence (AI)?

Artificial intelligence (AI) refers to the simulation of human intelligence in machines that are programmed to think like humans and mimic their actions. The term may also be applied to any machine that exhibits traits associated with a human mind such as learning and problem-solving.

Artificial intelligence (AI) is wide-ranging branch of computer science concerned with building smart machines capable of performing tasks that typically require human intelligence. AI is an interdisciplinary science with multiple approaches, but advancements in machine learning and deep learning are creating a paradigm shift in virtually every sector of the tech industry.

The ideal characteristic of artificial intelligence is its ability to rationalize and take actions that have the best chance of achieving a specific goal.



Understanding Artificial Intelligence

When most people hear the term artificial intelligence, the first thing they usually think of is robots. That's because big-budget films

and novels weave stories about human-like machines that wreak havoc on Earth. But nothing could be further from the truth.

Artificial intelligence is based on the principle that human intelligence can be defined in a way that a machine can easily mimic it and execute tasks, from the most simple to those that are even more complex. The goals of artificial intelligence include learning, reasoning, and perception.

As technology advances, previous benchmarks that defined artificial intelligence become outdated. For example, machines that calculate basic functions or recognize text through optimal character recognition are no longer considered to embody artificial intelligence, since this function is now taken for granted as an inherent computer function.

AI is continuously evolving to benefit many different industries. Machines are wired using a cross-disciplinary approach based in mathematics, computer science, linguistics, psychology, and more.

Applications of Artificial Intelligence

The applications for artificial intelligence are endless. The technology can be applied to many different sectors and industries. AI is being tested and used in the healthcare industry for dosing drugs and different treatment in patients, and for surgical procedures in the operating room.



Other examples of machines with artificial intelligence include computers that play chess and self-driving cars. Each of these machines must weigh the consequences of any action they take, as each action will impact the end result. In chess, the end result is winning the game. For self-driving cars, the computer system must account for all external data and compute it to act in a way that prevents a collision.

Artificial intelligence also has applications in the financial industry, where it is used to detect and flag activity in banking and finance such as unusual debit card usage and large account deposits—all of which help a bank's fraud department. Applications for AI are also being used to help streamline and make trading easier. This is done by making supply, demand, and pricing of securities easier to estimate.

Faculty Achievements:

- Mr.M.Venu Attended online FDP on “Data Science” from 20-04-2020 to 24-04-2020.
- T.Bhavani Presented Study on EBG structured CPW fed CM antenna for WiMAX,WLAN applications ICACCE-2019, IEEE Conference ,BIT from Apr 04 to 06- 2019.
- N.Soniya Attended Introduction to Satellite Communications from 29 April at Courseera
- K.Mallikarjuna Rao Attended Innovation, IPR, Entrepreneurship and Start-ups from 28th APRIL to 22nd MAY 2020 at MHRD's, IIC