July 2019 - Volume 1 / Issue 39



ABOUT IUCEE



Indo Universal Collaboration for Engineering Education (IUCEE) is aimed to to improve the quality and global relevance of engineering education in India. The Mission is to build an ecosystem for transforming engineering education in India with the assistance of engineering education experts and industry from around the world. The Mission is to build an ecosystem for transforming engineering education in India with the assistance of engineering education experts and industry from around the world.

The IUCEE College Consortium was formed in 2010 and has several member colleges making best use of this consortium. Members receive special assistance in establishing collaborations with international experts and institutions. Annual Consortium Membership fees enable IUCEE to be financially sustainable.

For more Information, refer to: http://iucee.org/iucee/

ABOUT ICTIEE 2020

ICTIEE 2020

The Seventh International Conference on Transformations in Engineering Education (ICTIEE' 2020) from IUCEE will CONNECT engineering educators from all over India with leaders from across the world as well as from industry. Participants will be able to SHARE best practices and thereby LEARN to TRANSFORM their own institutional efforts to prepare engineering graduates who can address global challenges as well as targeted initiatives of the Indian government. ICTIEE 2020 is being hosted at Anurag Group of Institutions, Hyderabad. IUCEE welcomes you to join them on this mission.

For more Information, refer to: http://ictiee.org/ictiee2020/

IIT students are choosing AI over computer science as job prospects change

More Indian students enrolling in IITs are opting for engineering courses in artificial intelligence and machine learning

IIT Hyderabad has been the first institute in the country to introduce B.Tech in AI technology, enrolling 20 students this year.

India is expected to create 39,000 new analytics jobs by 2020.

The advent of automation and the demand for changing job skills has attracted a large chunk of Indian students enrolling in India premier institution — Indian Institute of Technology(IITs) — for advanced in artificial intelligence and machine learning.

As industries face talent shortage in the sector, IITs recently rolled out degree programmes and certifications including a Bachelor of Technology (B.Tech) in Artificial Intelligence — providing diverse options in technology courses.

IIT Hyderabad has been the first institute in the country to introduce B.Tech in AI technology. The institute started its first batch this year,

"What surprised us was that many students this year chose BTech course in AI as against regular CSE (computer sciences) despite having a better score. It's a sign that students have realised the potential of AI as a career prospect considering the scope of research and jobs in the industry," Vineeth N Balasubramanian, associate professor at IIT Hyderabad

This year, the JEE advanced rank for opting AI stood at 478 and closed at 657. Overall, IIT Bangalore and IIT Delhi continue to remain top choices for engineering aspirants.

The industry estimates that India has less than 10% of data scientists available globally. According to a survey by Analytics Vidhya and ed-tech platform Great Learnings, India has 50,000 vacancies in data and analytics sector. In fact, the country is expected to create 39,000 new analytics jobs by 2020.

Coping with the growing demand

Indian IT majors including GE Research, Ericsson and Bosch, for their part, have also been funding various research programs at IITs.

Microsoft too recently announced that it will establish AI digital labs in India, jointly with 10 colleges and universities including Indian School of Business (ISB).

In its most recent budget, Indian government announced a key national programme focussed on AI under its 'Digital India' initiative. This will include the setting up of AI centers across the country to help AI-based startups in India.

Link: https://www.businessinsider. in/iit-students-choose-ai-over-computer-science/articleshow/70024844.cms

Driving technological change and innovation

With the business environment becoming more volatile, technology and innovation have become primary value propositions for organisations. Be it software products, mobile gadgets, power sector, virtual reality, wearable tech, internet connectivity, nanotechnology, Internet of Things, digital technology, artificial intelligence, machine learning, robotics and automation or automotive sector, Electrical and Electronics engineers are at the heart of every technological change and innovative solutions.

There is a high demand for Electrical and Electronics engineers today and it will only peak in the coming years. Here is a low-down on various specializations and trending career opportunities in this branch of engineering.

Specialisations Neurotechnology and Biomechatronics: This specialization focuses on the study of neuro-electronic interfaces and how they impact human body functions.

Robotics and Mechatronics: It deals with making robotic systems by combining the concepts of Electronics and Mechanical Engineering.

Power Electronics and Systems: This specialization looks into electric machines, energy and power machines, analog electronics, linear control systems and digital integrated circuit engineering.

Communications and Signal Processing: This specialization pertains to the study of communications and networking, signal and image processing, image reconstruction, pattern recognition and imaging informatics.

Electrophysics: Electrophysics blends physics and engineering to create complex devices and electronic instruments.

Computer Engineering: This specialization will give you insight into the computer network, architecture and communications, hardware and software. You will also get to learn about computer chips, microprocessors, digital computer design, CAD tools and electromechanical components.

Microelectronics and Quantum Electronics: In this specialization, you will be introduced to semiconductor materials and devices, semiconductor processing, instrumentation and control systems, computational electronics, quantum electronics and and lasers, plasma and fusion technology.

Career opportunities

Electronics and Communication Engineering (ECE) Industry: This industry comprises digital, power, consumer and analog electronics as well as communication and embedded systems. You will be responsible for the design, development, installation, management and maintenance of these devices.

This industry offers lucrative career options in ECE applications such as artificial intelligence, machine learning, power electronics, digital communication, robotics, automation and satellite and mobile communication.

Automotive: Right from designing an engine to safety systems and battery of vehicles, electrical engineers work on a number of components of vehicles. With the increasing demand for new and smart vehicles, there is a huge scope for Electrical and Electronics engineers in this field.

Aerospace: In this industry, engineers are responsible for the designs of aircraft, spacecraft and high-end avionics systems. It also includes testing of prototypes, analysis of electrical load and electrical components to be used.

Control and Instrumentation: This job profile requires you to design, build, install, operate and maintain engineering and control systems, equipment and machinery. It also involves acting as project managers, working in collaboration with other engineering departments and purchasing new equipment.

Computer Network: You can also explore a career in Computer Network Engineering after completing Electrical and Electronics Engineering. You would be expected to set up and maintain computer, voice and firewall network connectivity within or between organisations.

Oil and Gas: In this industry you will be required to provide technical and engineering guidance to onshore and offshore teams. Since the oil and gas industry uses several electrical and electronic instruments, sensors and systems, they need professionals from these branches.

Marine: In this industry you will be working on mechanical and electrical equipment, ship radio communications, automation and navigation systems.

Defence: You can join the Indian Army, Navy or Air Force as an Electrical and Electronic engineer. At an entry level, you would be largely responsible for routine supervision of engineering operations, systems and equipment. However, as you rise the ranks, you can be involved in strategic planning and research.

Biomedical: In this industry, you will be involved in the design and development of healthcare instruments to diagnose and treat diseases; materials that are safe to use inside human body and products that can facilitate motions within the body. This is a fast-emerging field with varied job profiles.

Power Generation: The power generation companies would expect you to work in the operations and maintenance departments. You have to ensure that the plant and related equipment work smoothly without any down-times.

Link:https://www.deccanherald.com/supplements/dh-education/driving-technological-change-and-innovation-746197.html

IonEDUCATION Products:

IonIdea (www.ionidea.com) has 88+ esteemed clients including universities, autonomous colleges, affiliated colleges in India and Malaysia for IonEducation Solutions! Thanks to all our mentors, domain partners, international advisers for helping our solutions to mature and meet the needs of higher education institutions. It has been a great journey for IonIdea since 2007 when autonomy began in Karnataka. Since then, we have added several innovative solutions to our portfolio in the areas such as Examination management ERP (with result processing addressing all the exceptions), Scanning & digitizing entire valuation process, Automation of end-to-end Outcome Based Education System (OBE SAR) to help accreditation process etc. In OBE & accreditation, our solution supports the process and SAR of all types of programs such as Engineering UG / PG (Tier 1 & II), Polytechnic, Pharmacy, MBA, MCA, Architecture etc.

IonCUDOS© (Outcome Based Education Software)

Integrates Curriculum Design, Delivery Planning, Assessment Planning and Attainment of Course Outcomes (COs), Program Outcomes (POs) through direct and indirect measures. Helps in institutionalizing outcome-based education by reducing the faculty workload, effort and time significantly.

IonEMS (Exam Management System)

Automates entire Student Lifecycle activities from Admission to graduation producing versatile reports required for Universities, Autonomous Colleges, Higher Educational Institutions and other Governing Bodies.

IonDVS© (Digital Valuation System)

Fair, Transparent, Innovative, Robust Evaluation platform which automates the entire Evaluation of Answer scripts reducing the Cost, time involved in result processing and Provides versatile reports, real-time analysis of evaluator, Evaluation, and posts evaluation data for Post Examination Data Processing like Result processing, Grading and OBE in a secured Manner.

We take this pride opportunity to thank all our esteemed customers for their trust in us!

For more details on IonEDUCATION products and demo, please log in to http://www.ion-education.com/







Please visit our site for earlier newsletters:http://www.ion-education.com/newsletter/

IonIdea

38-40, EPIP Zone, Whitefield, Bengaluru, Karnataka 560066 Office Phone: +91 (80)-665-81500 (extn. 1052, 1064) Email: edu@ionidea.com | Website: http://www.ion-education.com/

STAY CONNECTED



Share



Tweet



Share