



**Dr. Ashok Gujar Technical Institute's
Dr. Daulatrao Aher College of Engineering**



**Striving for Excellence
2022-23**

Department Of Computer Science & Engineering

Tomorrows Technology Through Todays Education



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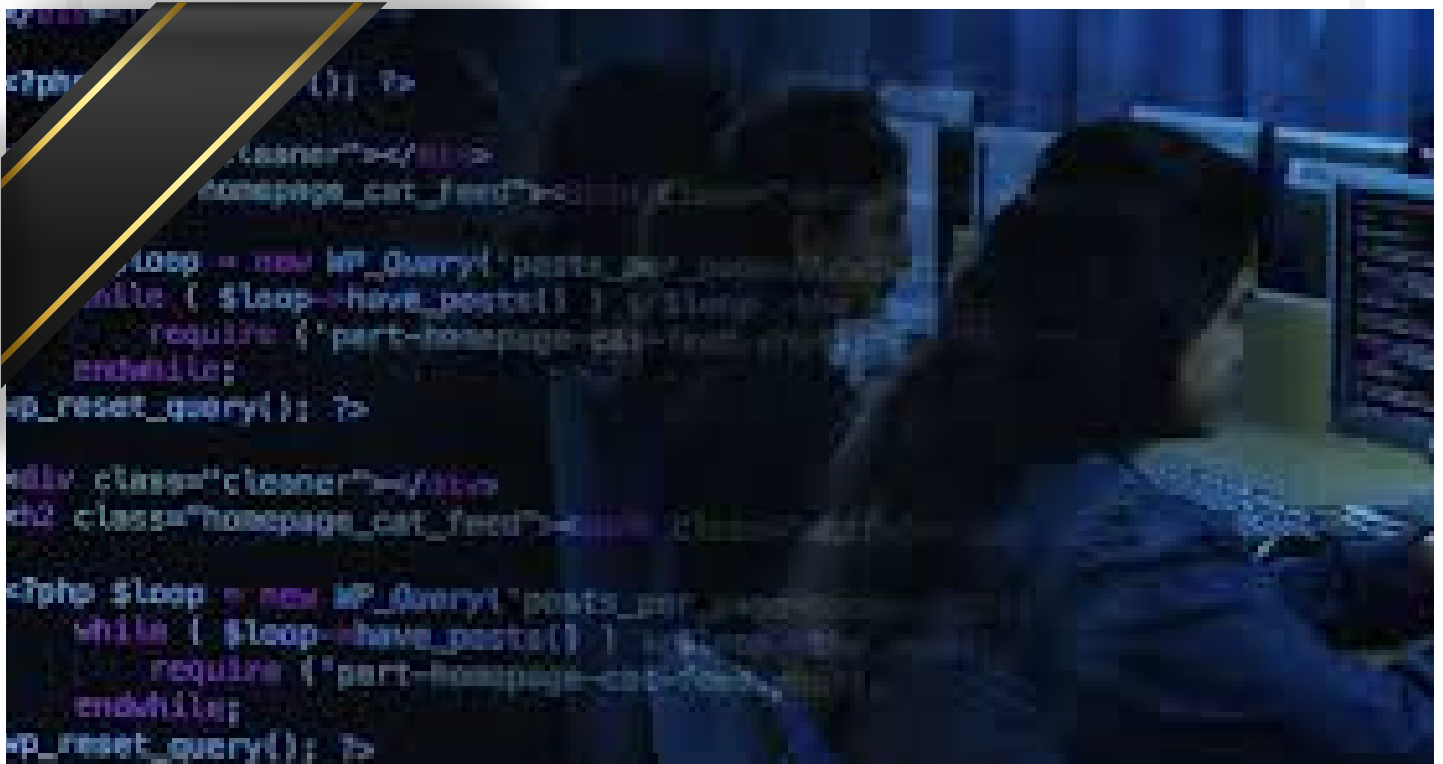
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VISION

"To produce competent engineers employable in the Computer Science and Engineering profession for socio-economic and sustainable development."



MISSION

- M1. Inducing learning practices for problem solving and technical skills to meet emerging trends in Computer Science and Engineering.
- M2. Collaborative work developing conducive relationship with stakeholders for continuous improvement and enhancing employability skill.
- M3. Grooming computer professionals with ethical values for inculcating research, entrepreneurship and leadership to serve the society in sustainable way.

ABOUT US

Department of Computer Science & Engineering Was established in the year 2008 with an intake of 60 students; where the future of computing resides here, providing techno rich facilities imparting quality of education for students to excel in their field. Department is stood strong having enthusiastic & experienced faculty members aiming for outcome based & quality of education- The main focus is to develop practical oriented activities. Students are trained through various workshops, SenypafS, expert talks & internship programs making them skilled professionals having ability to solve real World problems.

Department having tie-up with various industries such as Relience-Jio, Microsoft, Prygma, ITuiunwetc_ in order to, promote placements & to bridge gap between academics & industry Department has proactively accomplished the responsibilities of providing computing facility, IT support & consultancy for computer hardware & maintenance.

Department is taking initiatives by contributing in social activities such as E-governance_ E-services, Environmental Sustainability etc. It also provides strong support system by giving various types of scholarships for economic and deserving candidates.

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Artificial Intelligence



Artificial Intelligence is the simulation of human intelligence processes by machines, especially computer systems. Specific applications of AI include expert systems, natural language processing, speech recognition and machine vision.

Features of AI are Eliminate Dull and Boring Tasks, Data Ingestion Data ingestion is one of the most important features of artificial intelligence,

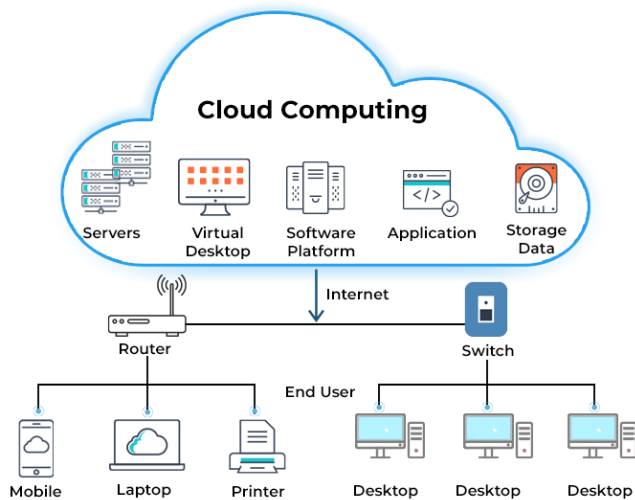
Imitates human cognition we call it an artificially intelligent system because it essentially imitates or mimics the way the human mind thinks and solves problems. This feature is makes AI unique, Futuristic AI-enabled systems are designed to observe and react to their surroundings, Prevent natural disasters we are all friendly with using AI for our businesses, for our gaming profiles, and more such purposes.

AI can be categorized into four types, beginning with the task-specific intelligent systems in wide use today and progressing to sentient systems, which do not yet exist. The AI are categorized in Reactive machines, Limited memory, Theory of mind, Self-awareness. Reactive AI uses algorithms to optimize outputs based on a set of inputs. Limited memory system have memory, so they can use past experiences to inform future decisions, Theory of mind system is a psychology term. When applied to AI, it means the system would have the social intelligence to understand emotions. Self-awareness system have a sense of self, which gives them consciousness. Machines with self-awareness understand their own current state. This type of AI does not yet exist. The year 2022 brought AI into the mainstream through widespread familiarity with applications of Generative Pre-Training Transformer. The most popular application is OpenAI's ChatGPT.



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CLOUD COMPUTING ARCHITECTURE



Simply put, cloud computing is the delivery of computing services—including servers, storage, databases, networking, software, analytics, and intelligence over the internet (“the cloud”) to offer faster innovation, flexible resources, and economies of scale.

Public cloud

Public clouds are owned and operated by third-party cloud service providers, which deliver computing resources like servers and storage over the internet.

Private cloud

A private cloud refers to cloud computing resources used exclusively by a single business or organization.

Hybrid cloud

Hybrid clouds combine public and private clouds, bound together by technology that allows data and applications to be shared between them.

Uses of cloud computing

You’re probably using cloud computing right now, even if you don’t realize it. If you use an online service to send email, edit documents, watch movies or TV, listen to music, play games, or store pictures and other files, it’s likely that cloud computing is making it all possible behind the scenes.

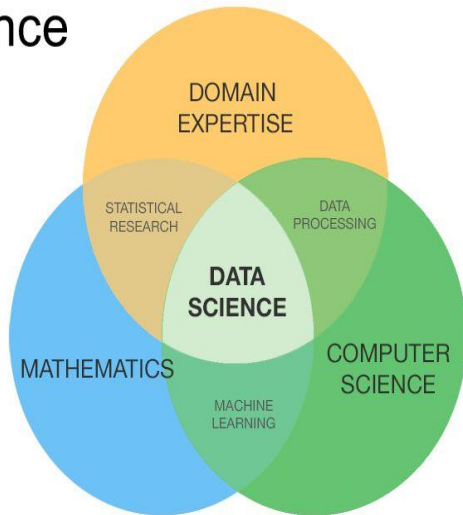


Tanmay.R.Sonawane

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DATA SCIENCE

Data Science

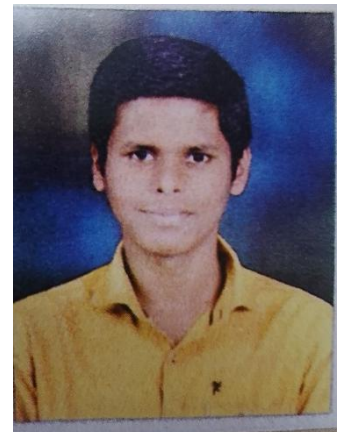


Source: Palmer, Shelly, *Data Science for the C-Suite*.
New York: Digital Living Press, 2015. Print.

Data Science is the study of handling and extracting meaningful insights from large data sets using modern tools and algorithms. The meaningful insights drawn from the data help us in decision-making.

Data Science has been widely used in businesses

for better decision-making of to make more and more profits. Data Science helps in extracting meaningful insights. These insights are used in various sectors, such as e-commerce, medicine, social media, entertainment, human resources, etc., to make better-decision making models, which will increase the profit of the respective sectors. In today's world, data is being generated at an alarming rate. Every second, lots of data is generated; be it from the users of Facebook or any other social networking site, or from the calls that one makes, or the data which is being generated from different organizations.



Omkar Yelave
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Virtual Mouse Using Hand Gesture Recognition

The PC mouse is one of the wondrous developments of people in the field of Human-Computer Interaction (HCI) innovation. In new age of innovation, remote mouse or a contact less mouse actually utilizes gadgets and isn't liberated from gadgets completely, since it utilizes power from the gadget or might be from outside power sources like battery and gain space and electric power, likewise during COVID pandemic it is encouraged to make social separating and keep away from to contact things which gave by various people groups. Inside the projected AI virtual mouse utilizing hand signal framework, this constraint might be resolve by involving advanced camera or sacred camera for perceive the hand motions and fingers recognition abuse PC machine vision. The algorithmic rule used in the framework utilizes the man-made consciousness and AI algorithmic rule. Upheld the hand signals, the gadget might be controlled pretty much and might do left click, right snap, looking over capacities and PC gadget pointer perform while not the utilization of the genuine mouse.



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