



SREE VIDYANIKETHAN ENGINEERING COLLEGE

(AUTONOMOUS)

Sree Sainath Nagar, A. Rangampet – 517 102

Department of Information Technology

Newiz-IT 2018-19

A Creed on Technology
e-News letter – Issue 2

Department Profile:



The Department currently offers undergraduate program B.Tech in Information Technology. The present intake is 120. We provide state of the art facilities both in the classrooms as well as in the laboratories. The department has a team of well qualified, experienced and committed staff members. It provides an atmosphere conducive for acquiring knowledge and emphasizes on practical learning. The department motivates both cultural and physical activities.

Message from the HoD:



I am happy to share the developments being made to project the activities of the students through this newsletter wherein it explores the information on the student support, mentoring, tutoring, study skills, workshops and career developments activities in the Department. I would like to congratulate all members of the editorial board for their sincere effort to release this new edition of venture. I earnestly wish and sincerely hope that the new publication turns out to be a resounding success.

VISION

To become a nationally recognized quality education center in the domain of Computer Science and Information Technology through teaching, training, learning, research and consultancy.

MISSION

- ✚ The Department offers undergraduate program in Information Technology and Post graduate program in Software Engineering to produce high quality information technologists and software engineers by disseminating knowledge through contemporary curriculum, competent faculty and adopting effective teaching-learning methodologies.
- ✚ Igniting passion among students for research and innovation by exposing them to real time systems and problems
- ✚ Developing technical and life skills in diverse community of students with modern training methods to solve problems in Software Industry.
- ✚ Inculcating values to practice engineering in adherence to code of ethics in multicultural and multi discipline teams.

Program Educational Objectives:

After few years of graduation, the graduates of B. Tech. (IT) Program would have:

- PEO1. Enrolled or completed higher education in the core or allied areas of Computer Science and Information Technology or management.
- PEO2. Successful entrepreneurial or technical career in the core or allied areas of Computer Science and Information Technology.
- PEO3. Continued to learn and to adapt to the world of constantly evolving technologies in the core or allied areas of Computer Science and Information Technology.

Program Specific Outcomes:

On successful completion of the program, the graduates of B. Tech (IT) program will be able to:

- PSO1. **Data Management:** Design and develop database systems, apply data analytics techniques, and use advanced databases for data storage, processing and retrieval.
- PSO2. **Information Security:** Apply network security techniques and tools for the development of highly secure systems.
- PSO3. **Application Development:** Analyze, design and develop efficient algorithms and software applications to deploy in secure environment to support contemporary services using programming languages, tools and technologies.
- PSO4. **Intelligent Systems:** Apply concepts of computer vision and artificial intelligent for the development of efficient intelligent systems and applications.

Achievements:

- ✦ Ms. V. Jyothsna, Assistant Professor of IT acted as reviewer for 2nd International Conference on Advanced Computational and Communication Paradigms -2019 (ICACCP-2019).

Published in Journals:

- ✦ Dr. L. V. Reddy, "A study on the Result Comparison of the Proposed Process with Respect to Other Proposal", Journal of Emerging Technologies and Innovative Research, Vol. No: 6(1) and Page nos: 444-449, ISSN: 2349-5162, 2019.
- ✦ Dr. L. V. Reddy, " Multi-objective optimization of information sharing costs to minimize operating costs and maximize revenue in a supply chain", International Journal Of Research And Analytical Reviews (Ijrar), Vol.No:6(2) E-ISSN 2348-1269, P- ISSN 2349-5138, 2019.
- ✦ Dr. A. Srinivasulu, "A Survey on Bigdata and Blockchain Technology", International Journal of Research and Analytical Reviews, Vol. No: 6(2), E-ISSN 2348-1269,P-ISSN 2349-5138,2019.
- ✦ Dr. A. Srinivasulu, "A Survey on Information Flow Monitoring System using Skyline Algorithm", International Journal of Computer Sciences and Engineering, Volume-07, Issue-06, Page no. 1-8, ISSN 2347-2693, 2019.
- ✦ Dr. A. Srinivasulu, "A Survey on A Survey on Diagnosis of Dental Cavities Data Using Big Data Technologies", Journal of Emerging Technologies and Innovative Research (JETIR), Volume 6, Issue 5, ISSN-2349-5162, 2019.

- ✦ Dr. K. Khaja Baser, "A Systematic Literature Review on Obstacle Detection for Visually Impaired People", International Journal of Computer Sciences and Engineering, Vol. No:7(6), ISSN 2347-2693, 2019.
- ✦ Dr. K. Khaja Baser, "Analyzing various Regression Models for data Processing", International Journal of Innovative Technology and Exploring Engineering (IJITEE), Vol.No:8(8),ISSN:2278-3075, 2019.

Published in Conferences:

- ✦ Dr. K. K. Baseer presented a paper on "A Systematic Literature Review on Obstacle Detection for Visually Impaired People", National Conference on Advances in Data Science and Engineering Applications at Department of Computer Science, Sri Venkateswara University during 8th – 9th February 2019.
- ✦ Dr. Asadi Srinivasulu presented a paper on "A Survey on Information Flow Monitoring System using Skyline Algorithm", National Conference on Advances in Data Science and Engineering Applications at Department of Computer Science, Sri Venkateswara University during 8th – 9th February 2019.
- ✦ Dr. K. Ramani presented a paper on " Secure Data Storage Scheme Using Blockchain in Federated Cloud", National Conference on Advances in Data Science and Engineering Applications at Department of Computer Science, Sri Venkateswara University during 8th – 9th February 2019.
- ✦ Dr. J.Vellingiri presented a paper on " Application of IoT based Smart Security and Monitoring Devices for Agriculture", 5th International Conference on Science Technology Engineering & Mathematics, Probing Artificial Intelligence Techniques and Research in IoT[PATRIOT] during 14th – 15th March 2019.
- ✦ Ms. E.Sandhya presented a paper on "Securing IOT: popular attacks on IoT layers ,security requirements and considerations", International Conference on Internet of Things- ICIoT 2019 at Department of Computer Science & Engineering, SRM Institute of Science and Technology,during March 11th-15th 2019.
- ✦ Dr. O. Obulesu Presented a paper on " Application of Big data Analytics in power system under single Transmission Line Outage conditions", IEEE-3rd International Conference on Trends in Electronics and Informatics(ICOEI 2019) during 23-25 April 2019 ISBN:978-1-5386-9439-8

Workshops/Conference /FDP Organized:

- ✦ Dr.O.Obulesu and Mr. M. Mahendra organized One Week Faculty Development Program on "Free and Open Source Software (FOSS)" on 03.12.2018 to 07.12.2018.

One day Workshop on NPTEL Awareness



IIT- Madras and Department of Information Technology jointly organized a one day National Level Workshop on “NPTEL (National Programme on Technology Enhanced Learning)” on January 11th, 2019 at Sree Vidyanikethan Engineering College, A. Rangampet. Prof. Andrew Thangaraj, NPTEL Coordinator, IIT Madras, Ms. Bharathi Balaji, Senior Project Officer, IIT Madras, Dr. P.C. Krishnamachary, Principal, SVEC, Dr.K.Ramani, HoD & Professor of IT, Convener of the Programme and Dr. A. Srinivasulu, Professor of IT and Coordinator of the Programme were present during the inaugural.

One Day Faculty Development Programme On” REDHAT LINUX and OPEN SOURCE”



Department of Information Technology organized one day Faculty Development Programme (FDP) on “Redhat Linux and Open Source” on 26th March, 2019 at Sree Vidyanikethan Engineering College, A. Rangampet. About 60 members of faculty actively participated and gained useful information from all the sessions.

Two Day National Level Research Expo Workshop on "Data Science"



Data Analytics Research Center and Department of Information Technology organized a Two Day National Level Research Expo & Workshop on "Data Science" during 21-22 January, 2019 at Sree Vidyanikethan Engineering College, A. Rangampet. About 340 students and members of faculty attended the programme. In this event, around 30 models and 50 posters were presented by the participants in various applications of Data Science.

Workshops/Conference /FDP Attended:

- ✚ Dr.L.V.Reddy attended Two Day National Workshop on "Preparing for NBA Accreditation & SAR Filling", from 18-02-2019 and 19-02-2019 at JNTUH, Hyderabad
- ✚ Dr.K.K.Baseer attended One Day Workshop on "intellectual property rights & patents" on 30-03-2019 at SV College of Engineering Karakambadi Road Tirupati
- ✚ Dr.A.Srinivasulu attended One Day FDP and Workshop on "Climate across the Curriculum: Educational Resources for Teachers" on 27-04-2019 at IIT, Tirupati
- ✚ Dr.A.Srinivasulu attended Two Day Workshop on "Artificial Intelligence and Machine Learning " from 02-02-2019 To 03-02-2019 at Tirutsava 2019 techno cultural fest of IIT-Tirupati.
- ✚ Dr.L.V.Reddy attended One day Workshop on "Consortium of Library Resources & DELNET Services" on 08-05-2019 at NTR Auditorium, JNTUA.
- ✚ Dr.A.Srinivasulu attended Three Day FDP on "Student Induction" from 10-06-2019 To 12-06-2019 at Chadalawada Ramanamma Engineering College.

Online Certifications:

- ✦ Dr. A. Srinivasulu Successfully complete a online Certification on "Programming in C++", by NPTEL, January-April 2019
- ✦ Dr. O. Obulesu Successfully complete a online Certification on "Data Sciences for Engineers", by NPTEL, January-April 2019
- ✦ Ms.V.Jyothsna Successfully completed online course of 2.5 hours of Ethical Hacking with Wireshark by Udemey
- ✦ Ms.V.Jyothsna Successfully completed online course of 9.5 hours of Blockchain & Cryptocurrency (Bitcoin, Ethereum) Essentials by Udemey
- ✦ Mr.B.Bhaskar Kumar Rao Successfully completed online course on CS215.2: Agile Solutions for greater Innovation offered by BerkeleyX
- ✦ Mr.A Uma Mahesh Successfully completed online course 4 hours of continuing education by participating in IPD Week offered by CISCO
- ✦ Dr.K.Ramani, Dr.L.V.Reddy and Ms.V.Jyothsna Successfully complete a online Certification on "Cryptography and Network Security", by NPTEL, January-April 2019
- ✦ Mr.P. Bhasha, Ms.E.Sandhya and G.uma Mahesh Successfully complete a online Certification on "Internet of Things" , by NPTEL, January-April 2019
- ✦ Dr.A Srinivasulu, Ms.C.Silpa, Ms.Ch.Prathima, Mr.Ch.Sreenu Babu and Ms.B.Sangamitra Successfully complete a online Certification on "Problem solving through c" , by NPTEL, January-April 2019
- ✦ Dr.O.Obulesu, Mr.V.S.V.S.S.S. M Chakradhar Successfully complete a online Certification on "Introduction to Automata, Languages and Computation", by NPTEL, January-April 2019
- ✦ Dr.O.Obulesu, Mr.M.Trilok Reddy Successfully complete a online Certification on "Compiler Design" by NPTEL, January-April 2019
- ✦ Mr. Mr.V.Lokanadham Naidu Successfully complete a online Certification on "Joy of Computing Using Python" by NPTEL, January-April 2019

Guest/Expert Lectures:

- ✦ Organized One Day Expert Lecture for II B.Tech students on "Advanced Driver Assistance Systems & Simulations" by Mr. Jaswanth N, Ph.D Scholar, Indian Institute of Information Technology (IIIT), Sri City.
- ✦ Expert Lecture on "Smart Transportation" by Dr. Hrishikesh Venkataraman, Associate Professor, Indian Institute of Information Technology (IIIT), Sri City
- ✦ One Day Expert Lecture for III B.Tech students On "Career Guidance" by T. Vaishnavi Software Engineer, IBM Company, Pune

- ✚ Guest Lecture on "Higher Education in Premier Institutes and Benefits" by Ms. C. Pranava Reddy, pursuing MSIT in IIIT Hyderabad.
- ✚ Guest Lecture on "Employability Skills" by Mr. A. Pavan Teja, Working as Software Engineer at CGI, Bangalore (Alumni of IT)
- ✚ Guest Lecture on "Awareness session & Mock Training Classes(GATE/IES/ PSU)- Higher Education at IITs/NITs" by Mr. Dinesh Gutha, Software Engineer at Cisco Systems.
- ✚ Guest Lecture on "Role of Coding Skills in IT Career" by Ms. K. Prathyusha, Senior Software Engineer at Global Edge Software Ltd. Bangalore
- ✚ Guest Lecture on "Design Thinking and Organizational Behavior" by Mr.Preetham, HR Manager and Developer, Phoenix Analytics Ltd, Tirupati
- ✚ Guest Lecture on "Corporate Ethics" by Mr. V. Jeyakrishnan, Manager (Client Engagement), Aspire Systems Pvt Ltd, Chennai

ICT Tools:

ICT tool can be any educational tool like Moodle Cloud, Canvas, Google Classroom, etc

1. Creation of course with Pre-requisite, course description, objectives, outcomes and syllabus.
2. Students course registration.
3. Announcements about course activities schedule.
4. Conduction of Diagnostic Test and Formative Tests with different form of questions such as multiple choices, Fill in the blanks, True/False, Short and Essay answers, Missing words, Match the following, etc.

www.kkbaseer.moodlecloud.com

www.kkbaseerdemo.moodlecloud.com

www.vjyothsna.moodlecloud.com

www.ramanisvecit28.moodles.com

computernetwork.moodlecloud.com

www.svecit44wt.moodlecloud.com

www.silpa.moodlescloud.com

Students Achievements:

- ✚ Adithya Sai (16121A1226) bagged 1st Prize for presenting Paper on " Data Mining in Selection" Avishkar-GYANITH'19, National Institute of Technology, Puducherry, from 28.02.2019 to 02.03.2019
- ✚ T. Anjali (17121A12A0), Shaik Asifa (17121A1296) bagged 1st Prize for presenting Paper on " Smart Transportation using IoT", Two Day National Level

Technical Symposium "Cynosure 2K19" on 30.03.2019 to 31.03.2019 at Sri Venkateswara University, Tirupati

- ✚ V.S.Asha(16121A12A6), Talari Madhu Prakash (16121A1298), Nallagatla Veeranjanyulu (16121A1270) bagged 1st Prize for Model on " Smart Cane for Visually Impaired People", Two Day National Level Research Expo and Workshop on "Data Science" during January 20-21, 2019 at SVEC, Tirupati.
- ✚ M. Chandrika (16121A1265), P. JANAKI (16121A1273) and Viswanatham Harsha Vardhan (16121A12B5) bagged 3rd Prize for Model on "Smart shopping Cart", Two Day National Level Research Expo and Workshop on "Data Science" during January 20-21, 2019 at SVEC, Tirupati.

Research Talks:

- ✚ Dr. L. V. Reddy, Professor, Department of IT, delivered Technical Talk on "Block Chain Technology" on 27.02.2019
- ✚ Ms. E. Sandhya, Asst. Professor, Department of IT, delivered Technical Talk on "Open Research Challenges in IoT Security" on 29.03.2019
- ✚ Mr. B. Bhaskar Kumar Rao, Asst. Professor, Department of IT, delivered Technical Talk on "Test Suite Optimization using Evolutionary Approach" on 26.04.2019

ARTICLES:

The Cloud is more than Technology - it's a generational shift

Cloud computing is perhaps the most flamboyant technological innovation of the 21st century. This is because it has seen the fastest adoption into the mainstream than any other technology in the domain. This adoption has been fueled mainly by the ever-increasing number of smartphones and mobile devices that can access the internet.

'Why the cloud computing is important ?' is the question which arises in all our minds. Pooled computing resources available through cloud computing have been proven to offer tremendous benefits to business organizations. Unraveling are these benefits broadly classified into three categories that include efficiency, flexibility, and strategic value.



The demand for the cloud computing will increase rapidly in future. Cloud computing is helping the society to cope with future problems such as managing big data, cyber-security and quality control. In addition to this, emerging technologies such as Artificial Intelligence, distributed ledger technology, and many other capabilities are becoming available as services through cloud computing.

There are so many researches going on this aspect .The list of the researches are green cloud computing, edge computing, cloud cryptography, load balancing, cloud analytics, cloud scalability, service model, cloud computing platforms, mobile cloud computing, big data,cloud development model, cloud security.

The top most companies providing best jobs for cloud computing are Microsoft azure, Kamatera, VMware, IBM cloud computing, Oracle corporation etc..



Microsoft azure



Kamatera



IBM cloud computing

B.Yasmeen Shadab
(18121A1209)



EDGE COMPUTING

What does edge computing matters?

Edge computing in IT is defined as the deployment of data-handling activities or other operations away from centralized and always-connected network segments, and toward individual sources of data capture, such as endpoints like laptops, tablets or smartphones. Through this type of network engineering, IT professionals hope to improve network security and enhance other network outcomes. Edge computing is one of the top five technologies in today's world. With deployments of IoT devices and the arrival of 5G fast wireless, placing compute and analytics close to where data is created is making the case for edge computing.

Generally, the term "edge computing" is used as a kind of catch-all for various networking technologies including peer-to-peer networking or ad hoc networking, as well as various types of cloud setups and other distributed systems. One other predominant type of edge networking is mobile edge networking or computing, an architecture that utilizes the edge of the cellular network for operations.

One of the major uses of edge computing is to improve network security. There is a lot of concern about security architecture in the internet of things age, where more and more diverse devices are getting different kinds of access to a network. One strategy is to pursue edge computing to aggregate data further out, and encrypt it as it passes further in, for example, through firewalls and perimeters.

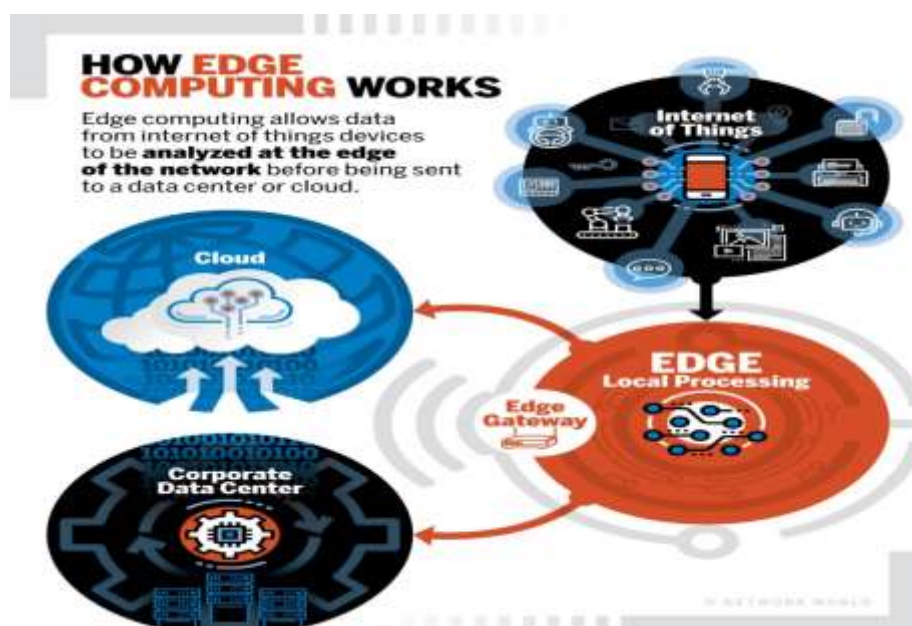
“Reducing latency by a few seconds on a smartphone certainly improves the user experience”

Edge computing optimizes internet devices and web applications by bringing **computing** closer to the source of the data. This minimizes the need for long distance communications between client and server, which reduces latency and bandwidth usage, or help with a detailed network virtualization model.

Edge computing works in various ways and contributes to IT architectures in different capacities. It is a frequent and popular means of enhancing networks to promote efficiency and more capable security for business systems.

The key benefits of edge computing are:

- ✚ Decreased latency
- ✚ Decrease in bandwidth use and associated cost
- ✚ Decrease in server resources and associated cost
- ✚ Added functionality



Faster networking technologies, such as [5G](#) wireless, are allowing for edge computing systems to accelerate the creation or support of real-time applications, such as video processing and analytics, self-driving cars, artificial intelligence and robotics, health care to name a few.

S. SAINI REDDY, 18121A1296



T. SUSMITHA CHOWDARY, 18121A12A4



Photo Gallery



Dr. Bhanu Prasad Pinnamaneni, Director (R&D) delivering a lecture on "Real Life Applications of Data Science".



Smt. Komala Raveendra, Entrepreneur, delivering a lecture on "Project Development Skills".



Dr. O. Obulesu, Mr. Pranab Kumar T, Mr. Jashwanth N and Mr. Vikram N delivering the lectures.