Chief Patron

Sri. Ananthula Vinay Kumar Reddy, Chairman

Patrons

Sri. Chintala Ravindranath Yadav, Secretary

Sri. Nirvetla Sharath Reddy, CEO & Treasurer

Sri. Ananthula Hriday Reddy, Vice-Chairman

Co-Patron

Dr. S. Sai Satyanarayana Reddy, Principal

Professor of CSE

Convenors

Dr. Shaik Abdul Nabi, Head of the Department

Professor of CSE

Dr. D. Shanthi,

Associate Professor, CSE

ADVISORY COMMITTEE:

Dr. A.Govardhan, Rector - JNTUH

Dr. G. Narasimha, Professor, JNTUH

Dr. D. Vasumathi, Professor, JNTUH

Dr. P. Premchand, Former Dean, OU

Dr. Suresh Akella, Professor, MECH

Dr. V. Goutham, Professor, CSE

Dr. M. Purushotham, Professor, CSE

Dr. S.V Achuta Rao, Professor, CSE

Prof. B.Sreenivasu, HOD - ECE

Prof. Md. Naseeruddin, HOD - H&S

Prof. Y. Krishna, HOD - MECH

Prof. T. Ranjith Kumar, HOD I/C - CIVIL

ORGANIZING COMMITTEE:

Mr. G. Sravan Kumar, CSE

Mrs. Padma Joshi, CSE

Mr. C. Phaneendra, CSE

Mr. V. Biksham, CSE

Mr. P. Nagaraj, CSE

Mr. K. Rohit Kumar, CSE

Mrs. P. Archana, CSE

Mr. N.Santhosh Ramchander, CSE

Mrs. K.Madhuravani, CSE

Mrs. A.Swathi, CSE

Mrs. K.Ramya Laxmi, CSE

Mrs. N.Swapna Suhasini, CSE

Mrs. Meenakshi, CSE

Mrs. Sravani K, CSE

Mr. Salar Mohd, CSE

Mr. R.Prashanth Kumar, CSE

Mr.K. Narasimhulu, CSE

Resource Persons

Dr.Venugopal Rao Manneni

General Manager

Just Smartmandate, Data Scientist-Medeva.io

Dr. K. Bala Prakasa Rao

Assistant Professor, NIT Warangal.

Dr. Kalyani Dacha

Associate Director, Deloitte.

Dr. Y.V.K.Ravi Kumar

Associate Professor, CSIS- Group, BITS Pilani Hyderabad.

Dr.V.V. Haragopal

Professor, BITS Pilani, Hyderabad.

Dr.Vivek Tiwari

Professor, IIT Naya Raipur.

Registration Link

https://forms.gle/hNekbXW8zMUvppo66

Registration Fee

Staff, Research Scholars/Internal Staff : **Rs. 200**/-

Note: Last Date for Registration: 24-01-2021.

Contact Us

Mr. G. Sravan Kumar

Assistant Professor, Dept. of CSE

Phone: 9441926953, **Email:** cse_fdp_2021@sreyas.ac.in

SREYAS

INSTITUTE OF ENGINEERING AND TECHNOLOGY

One Week Online Faculty Development Programme

On

RESEARCH TRENDS IN AI & ML

(25th January to 30th January, 2021)

Organized by:

Department of Computer Science and Engineering

SREYAS

INSTITUTE OF ENGINEERING & TECHNOLOGY

(Approved by AICTE, New Delhi, Affiliated to JNTUH Hyderabad.)

Accredited by NAAC

Bandlaguda, Nagole, Hyderabad - 500068.

Website: www.sreyas.ac.in

About SIET:

Sreyas Institute of Engineering and Technology (SIET), sponsored by Sreyas Educational Society is established in the year 2011 in the state of Telangana by eminent educationists with a social conscience and commitment. The institution with a vision of serving the society through value-based education has been making a mark in the educational map of this region. Sreyas Institute is located in a sprawling campus of about 10.02 acres, amidst sylvan surroundings with aesthetically built infrastructure.

The institute offers academic programs with innovative curriculum, advanced research in cutting-edge technologies and societal engagement through outreach activities. It has grown in its size and stature

over the years with an initial intake of 300 to 720 students. The placements have reached new avenues with more than 300+ companies conducted interviews. Within a span of short time the Institute has grown in all the dimensions.

SIET is one of the premier Engineering Colleges in Telangana. The institute currently offers six undergraduate programmes (B. Tech) – Computer Science and Engineering; CSE Data Science; CSE Artificial Intelligence and Machine Learning, Electronics and Communication Engineering, Mechanical Engineering and Civil Engineering. The institution was accredited by NAAC and by National Board of Accreditation (NBA).

About the Department:

The Department of CSE is intellectually challenging discipline. This study will provide you with a strong foundation of knowledge in Problem-solving and logical thinking. Some of the areas of study are algorithms and data

structures, programming languages, software engineering, data base systems, Operating Systems to name a few.

A record number of jobs being created in computer science related fields.

Current Student intake: –

1. **B. Tech**- Program in Computer Science and Engineering has an intake of 240 students.

2. **B. Tech**- Programs in Data Science and AI & ML established in the year of 2020 with an intake of 120 each.

Seminars are an integral part of our academic programs and conducted every week. It acts as a means for students to deliberate on subjects from technical to current affairs and even inspiring videos are screened. Students-initiated clubs which are intended to generate curiosity in young minds and

promoting intelligent designs to help solving some of the problems in our daily life. Organizing and conducting technical events likes Code champ, Hackathon competitions will enhance and showcase the coding abilities of the students.

- We have Established CISCO Centre of Excellence Laboratory under Cisco Networking Academy where many students have undergone training.
- We are certified as AWS Cloud Academy Centre.

About FDP:

This FDP will provide an opportunity to highlight research trends and developments in the field of Artificial Intelligence and Machine Learning. It will further give impetus to the participants towards bringing out newer and efficient techniques. Expert invited speakers from both industry and academia with their vast research experience in various fields will arouse the participants for the development in emerging technologies.

The topics are focused in the FDP:

- Day 1: Why AI is a Social Good Technology?
- Day 2: Reinforcement Learning and its Applications using python.
- Day 3: Statistics in Data Science
- Day 4: Regression Analysis
- Day 5: Multivariate Data Analysis
- Day 6: Research Trends in AI &ML

Eligibility:

Faculty members of the AICTE approved institutions, Research Scholars and Industry experts.

Certification:

Every participant will be given E-Certificate after the successful completion of training program and Assessment.

Report One- Week Faculty Development Programme
On
"Research trends in AI and ML"
At
Sreyas Institute of Engineering and Technology, Bandlaguda
Hyderabad
25th -31st Jan 2021

About Program The primary objective of this one-week Faculty Development Program (FDP) on Research Applications in Artificial Intelligence and Machine Learning was to enrich faculty members of Computer Science stream with preliminaries of artificial intelligence and its modern applications in machine learning and deep learning. The FDP was divided into several modules falling under the umbrella of Artificial Intelligence including Machine Learning, Deep Learning, Data Science, Natural Language Processing and Digital Image Processing. The objective was to address modern trends in the field of Artificial Intelligence with real time problem solving. This FDP focused on hands-on implementation of various algorithms to deliver practical and theoretical knowledge to participants.

Date: 25th-30th Jan 2021 10.00 AM to 12:30 PM
Venue: CRT room, 2nd floor, CSE dept.
FDP Coordinator: Dr.D. Shanti (Department of Computer Science and Engineering)

Resource persons: Resource Persons:

1. Dr.Venugopal Rao Manneni, General Manager
   Just Smartmandate, Data Scientist-Medeva.io

2. Dr. K. Bala Prakasa Rao
   Assistant Professor, NIT Warangal.

3. Dr. Kalyani Dacha
   Associate Director, Deloitte.

4. Dr. Y.V.K.Ravi Kumar
   Associate Professor, CSIS- Group, BITS Pilani Hyderabad.

5. Dr.V.V. Haragopal
   Professor, BITS Pilani, Hyderabad

6. Dr.Vivek Tiwari
   Professor, IIT Naya Raipur

Organizing committee:
Mr. G. Sravan Kumar, CSE Mrs. Padma Joshi, CSE Mr. C. Phaneendra, CSE, Mrs. A.Swathi, CSE, Mrs. K.Ramya Laxmi, CSE Mrs. N.Swapna Suhasini, CSE Mrs. Meenakshi, CSE, Mrs. Sravani K, CSE Mr. Salar Mohd, CSE, Mr. R.Prashanth Kumar, CSE Mr.K. Narasimhulu, CSE, Mrs.

K.Madhuravani, CSE, Mr. N.Santhosh Ramchander, CSE , Mr. K. Rohit Kumar, CSE Mrs. P. Archana, CSE, MR. P. Nagaraj, CSE, Mr. V. Biksham, CSE

INAUGURAL SESSION:

The esteemed dignitaries' personalities present in inauguration of the programme:
Dr.N.Narasimha sir, from JNTU , Guest of honor,
Chairman shri. Ananthula Vinay Kumar Reddy garu,
Secretary Sri. Chintala Ravindranath Yadav garu,
CEO and Tresurer, Shri. N.Sharath Reddy garu,
Vice chairma sri. Anathula Hriday Reddy Garu.
Principal Dr. Sai Satyanarayana Reddy garu,
Head of CSE Dept Sri Abdul Nabi garu,
Head of ECE Dept Sri. B.Sreenivas garu,
Head of Mechanical Dept, Sri. Y.Srishnaiah garu,
Incharge Head of Civil dept Ranjith garu,
Head of H&s Dept Sri. Naseeruddin garu

Dr.Shanti, Co-ordinator , Mrs. A. Swathi and Mrs. K. Ramya Lakshmi Anchors welcomed all the cherished dignitaries and participants.

FDP Banner:

Welcoming Ceremony:

The technical education industry has undergone substantial changes in the last several decades. Faculty members serve as drivers of these changes when implementing new educational tactics, programs and policies. Industry interaction is the cornerstone to educational excellence. It is essential for professional education institutions in preparing their students to meet industry expectations and to become competent professionals in future. The faculty members, being key elements in the education system, are required to possess industry insights and to stay abreast of the changing industry practices, to facilitate career orientation among the students. The key to a strong faculty development program is a core group of energized faculties, committed to transforming learning, no matter what group on campus initially brings them together.

Day-1: 25th Jan

Speaker: Dr.VenugopaI Rao Manneni, General Manager
Just Smartmandate, Data Scientist-Medeva.io

In the session on Research Scopes and Recent Trends in Artificial Intelligence and Machine Learning, Dr.VenugopaI Rao Manneni covered overview and applications of AI. He explained that the exponential growth of business data, low-cost data storage, and Artificial Intelligence reaching maturity will lead to more businesses outsourcing their data center enter activities to cloud service providers. Also, the future of Machine Learning and Artificial Intelligence explains that while cloud brings agility to businesses, AI and ML will leave a major impact on business outcomes.

Day 2: 26th Jan

Speaker: Dr. K. Bala Prakasa Rao
Assistant Professor, NIT Warangal.

In the session he explained about various ML algorithms. Machine learning can be broadly defined as computational methods using experience to improve performance or to make accurate predictions. Here, experience refers to the past information available to the learner, which typically takes the form of electronic data collected and made available for analysis. This data could be in the form of digitized human-labeled training sets, or other types of information obtained via interaction with the environment. In all cases, its quality and size are crucial to the success of the predictions made by the learner.

Day 3: 27th Jan

Speaker: Dr. Kalyani Dacha
Associate Director, Deloitte.

Machine learning is used to predict, categorize, classify, finding polarity from the given datasets and concerned with minimizing the error. It uses training data for artificial intelligence.
Since there are many algorithms like SVM, Bayes algorithm, logistic regression, etc. which use training data to match with input data and then they provide conclusion with maximum accuracy. To make participants aware with various popular machine learning algorithms, Dr. Kalyani Dacha conducted session with introduction of image processing, various tools and techniques to work with image processing.

Day 4: 28th Jan

Speaker: Dr. Y.V.K.Ravi Kumar
Associate Professor, CSIS- Group, BITS Pilani Hyderabad.

In this session sir has explained various ML algorithms based on classification. In machine learning and statistics, classification is a supervised learning approach in which the computer program learns from the data input given to it and then uses this learning to classify new observation. This data set may simply be bi-class (like identifying whether the person is male or female or that the mail is spam or nonspam) or it may be multi-class too. After giving introduction to all types of machine learning classifiers, Dr. Ravi Kumar summarized mathematical representation of linear classification, regression with applications. The session was very much interesting and participants requested for extending the session for more time.

Day 5: 29th Jan

Speaker(s): Dr. Shanti, CSE, SIET, and
Dr.V.V. Haragopal ,Professor, BITS Pilani, Hyderabad

Dr Shanti mam has explained techniques in how to write a research paper.
Dr.V.V. Haragopal Sir explained TensorFlow applications as it is an open-source and most popular deep learning library for research and production. It covers basics to advance topics like linear regression, classifiers, create, train and evaluate a neural network like CNN, RNN, auto encoders etc.

DAY - 6 : 30th Jan

Speaker: Dr.Vivek Tiwari
Professor, IIT Naya Raipur

In this session, Dr.Vivek Tiwari sir covered a practical demonstration of how to perform regression analysis on data. He also explained the efficiency of artificial intelligence.

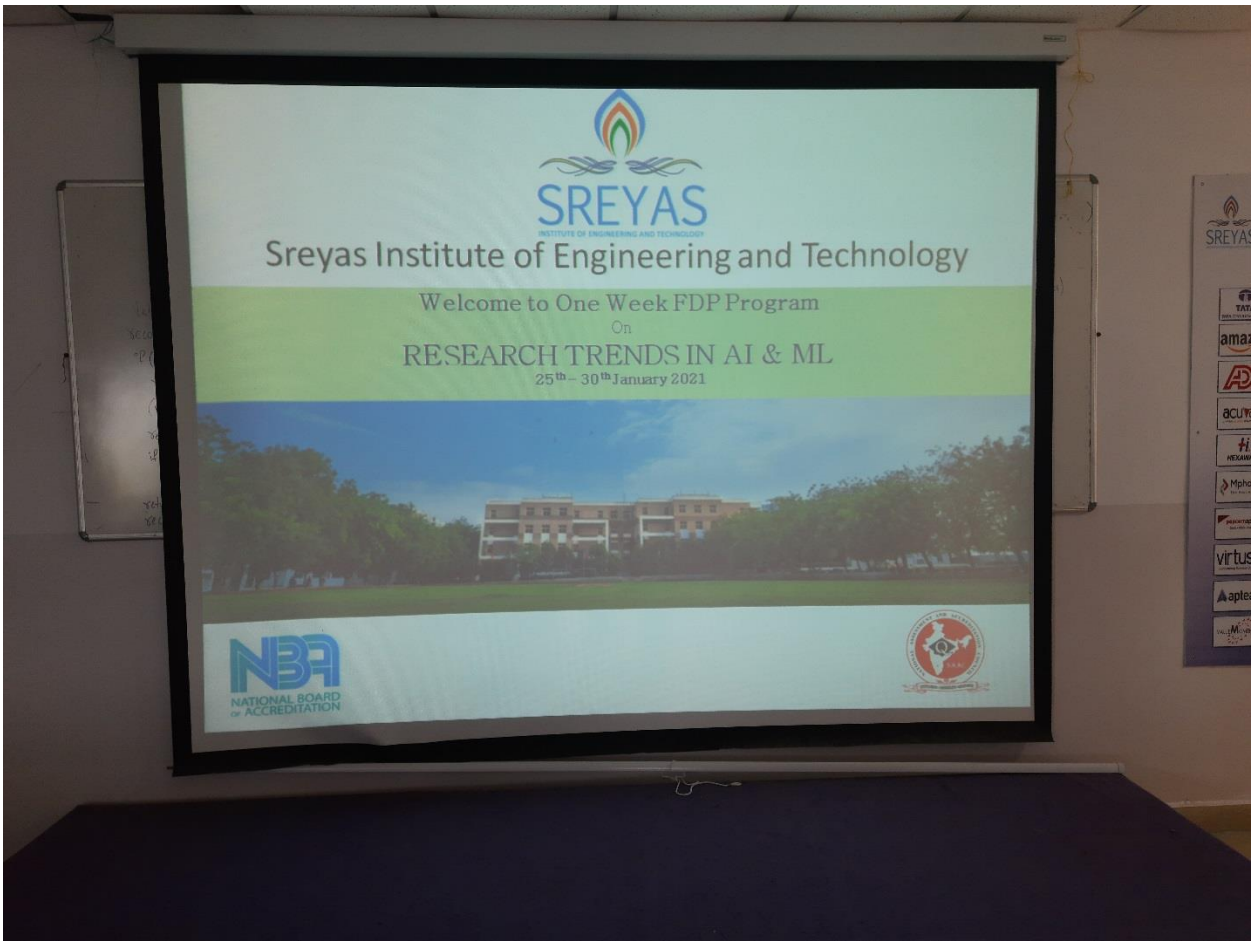
VALEDICTORY SESSION:

Receiving an overwhelming response with participants, A One-week FDP on "Research Trends in AI and ML" came to an end with valedictory session, graced by Speaker and Guest of Honor Mr Dr.P.Premchand, Former Dean, OU. Chairman shri. Ananthula Vinay Kumar Reddy Garu, Secretary Sri. Chintala Ravindranath Yadav Garu, CEO and Tresurer, Shri.Sharath Reddy Garu, Vice chairma sri. Anathula Hriday Reddy Garu. Principal, Sri. K.Sai Satya Narayana Reddy Garu, Head of CSE Dept Sri Abdul Nabi garu, Head of ECE Dept Sri. B.Sreenivas garu, Head of Mechanical Dept, Sri. Y.Srishnaiah Garu, I/C Head of Civil dept Ranjith garu, Head of H&s Dept Sri. Naseeruddin garu.

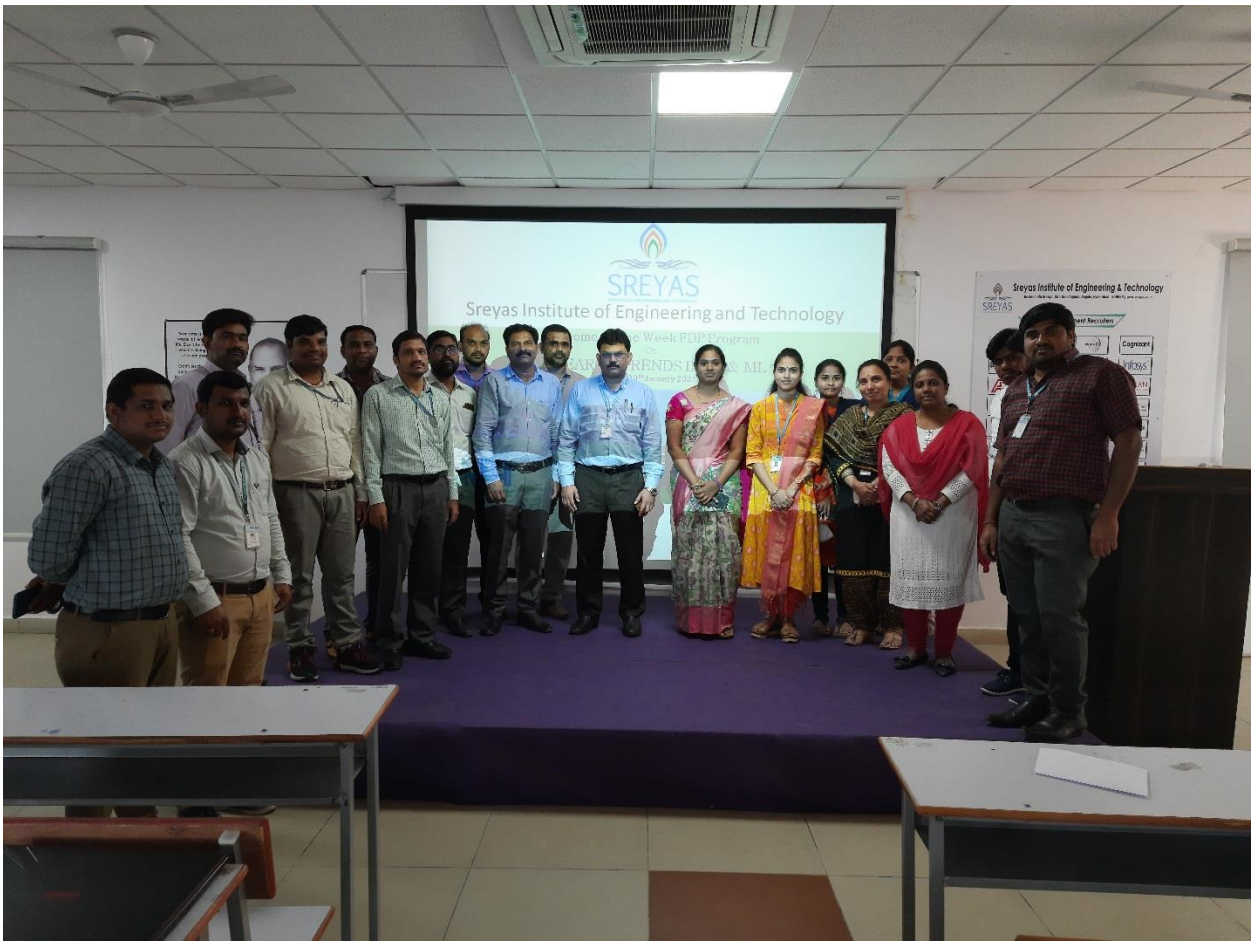
The program was ended with vote of thanks by Mrs. A. Swathi.

OUTCOME:

All the sessions were very much informative. The discussed areas are of great benefit for the participants as the topics match with the academic curriculum and beyond it. Participants were enlightened with the most widely used advance research trends in AI and ML. This in turn will help in motivating faculty.


SREYAS
INSTITUTE OF ENGINEERING AND TECHNOLOGY
Sreyas Institute of Engineering and Technology
Welcome to One Week FDP Program
On
RESEARCH TRENDS IN AI & ML
25th – 30th January 2021
NBA
NATIONAL BOARD OF ACCREDITATION

SREYAS
Sreyas Institute of Engineering and Technology
Cognizant
amazon


SREYAS
Sreyas Institute of Engineering and Technology
Sreyas Institute of Engineering & Technology
Cognizant
Infosys

SREYAS INSTITUTE OF ENGINEERING AND TECHNOLOGY

Affiliated to JNTUH Hyderabad, Approved by AICTE, New Delhi

(Accredited by NAAC)

Certificate of Appreciation

This is to certify that Dr. **Shaik. Abdul Nabi**

from **Sreyas Institute of Engineering and Technology**

as an convenor for the ***"One Week Hands-On Workshop on Python Programming for Machine Learning"***

Organized by Department of Computer Science and Engineering, Sreyas Institute of Engineering and Technology, Hyderabad from 22nd April to 28th April 2021.

Dr. S. Sai Satyanarayana Reddy
Principal
Professor of CSE