



Federal Institute of Science and Technology (FISAT)

# IMPETUS

Annual News Letter 2021

Vol 6. June 2021

## CONGRATULATIONS! UNIVERSITY RANK HOLDERS



## FISAT Launches Four New Programmes

- B.Tech - Computer Science and Design
- M.Tech - Artificial Intelligence and Data Science
- M.Tech - Automotive Electronics
- M.Tech - Renewable Energy

## COVID DASHBOARD



## PLACEMENTS

Research Publications	NPTEL Achievements	Cultural Programme	Library News	
Department Activities	Add on program	Bridge Programme	Faculty Achievements	MOUs
Virtual Project Exhibition	Healthy Practices	Students Activities	Online International FDP	
Invited Talks	Alumni Interactions	NSS Activities	Students Achievements	Professional Society Activities
Sports	Competitions	SWAN Activities	Retirements	



# FEDERAL INSTITUTE OF SCIENCE AND TECHNOLOGY

Approved by AICTE, Affiliated to APJ Abdul Kalam Technological University  
Hormis Nagar, Mookkannoor P.O., Angamaly-683577, Kerala, Ph : 0484 27225272, Email : mail@fisat.ac.in, Web : www.fisat.ac.in

## MANAGING COMMITTEE MEMBERS

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## ACADEMIC HEADS

1. **Dr. George Issac**, Principal
2. **Dr. C. Sheela**, Vice-Principal
3. **Dr. Joshua A J**, Director (in-charge)-FBS
4. **Dr. Prasad J C**, Head, CSE Dept.
5. **Dr. Jose Cherian**, Head, ME Dept.
6. **Dr. Mini P R**, Head, ECE Dept.
7. **Dr. Unnikartha G**, Head, CE Dept.
8. **Dr. Parvathy R**, Head, EEE Dept.
9. **Dr. Abi P Mathew**, Head, EIE Dept.
10. **Mr. Santhosh Kottam**, Head, MCA Dept.

## PH.D.AWARDED

On the happy occasion award of the Doctor of Philosophy (PhD) recognition of Dr. Anitha P, Chairman, a felicitation meeting was arranged and the FISAT family honoured her great achievement. She was awarded Ph.D from Bharathiar University, Coimbatore on the topic of 'Women Empowerment through Kudumbashree projects'. During the accepting speech, Dr. Anitha motivated the members of the FISAT family with her own life experiences related with the research activities.



## INSTITUTION DAY CELEBRATIONS



**FISAT  
 Founder Chairman,  
 Adv. P V Mathew**

The 20<sup>th</sup> institutional Day of Federal Institute of Science And Technology (FISAT) was celebrated on 23 September 2020. Ms. Anitha P, Chairman inaugurated the function and she gave a commemorative talk on P V Mathew, the founder Chairman of FISAT. She reminded us of the valuable contributions of the Founder Chairman, a leading visionary who thought ahead of times. Dr. George Issac, Principal, Presided over the function. Dr. C Sheela, Vice Principal felicitated the gathering. Mr. Mahesh C, Asst. Professor, Computer Science Engineering and Ms Jisha Jacob, Office Administrator, was awarded the Best Teacher award and the Best Non Teaching Employee award respectively. Due to Covid Protocol, the function was conducted in online mode.



Dr. Anitha P., Chairman giving the commemorative talk on Sri. P V Mathew on Institution Day.



Mr. Mahesh C., Asst. Professor, CSE Dept receives the Best Teacher Award on FISAT Institution Day 2020.



Ms Jisha Jacob, Office Administrator being awarded Best Non Teaching Employee award on FISAT Institution Day 2020



## OUR CHAIRMAN'S MESSAGE

Nurturing creativity and inspiring innovation are two of the key elements of successful education, and the sixth edition of the annual newsletter of Impetus 2021 is the perfect amalgamation of both. It harnesses the creative energies of the academic community, and distils the essence of their inspired imagination in the most brilliant way possible. It is my great pleasure to extend heartfelt warm greetings to the readers of the Annual Newsletter of FISAT, IMPETUS 2021. I deem it to be a matter of immense pleasure and honour for me to address you all through the annual newsletter Impetus 2021. It is indeed very heartening to witness that the college has carved a name for itself in the academic landscape of the region. Education is the most powerful tool to bring desirable changes in our personality and also to bring positive changes in our society. It is the only medium which enables you to move from darkness to brightness.

Dear friends, I strongly believe that, there can be no better way to drive and improve our nation's prosperity and socio-economic well-being than through its education system. I also believe that, technocrats are the key to the continued economic and technological advancement of our country.

I take this opportunity to urge you all to focus on all round development. You should always have your education laced with morality and ethics. You should all remember that, 'honesty is the first chapter in the book of wisdom' and we should inculcate honesty and integrity in all what we do. I earnestly hope and trust that my esteemed academicians and budding technocrats will work with sincerity, honesty and dedication to contribute to make this world a better place to live in. I take this opportunity to congratulate the editorial team for their hard work and effort bringing this news letter in a wonderful manner.

**Dr. Anitha P**

## OUR PRINCIPAL'S MESSAGE

It is a matter of great pride and satisfaction for FISAT to bring out the 6th volume of the News Letter 'IMPETUS'. The College has made tremendous progress in all areas of academic and non-academics sections in the best possible manner during this difficulty of the pandemic period. The College has achieved another milestone in getting NBA (National Board of Accreditation). I am confident that this issue of College News Letter will send a positive signal to the staff, students and the person who are interested in technical education and technology-based activities. A News Letter is like a mirror that reflects the clear picture of all sorts of activities undertaken by FISAT. I congratulate the editorial board of this News Letter who played a wonderful role in accomplishing the task in record time. Also my heartfelt Congratulations to staff members and Students for their fruitful effort.

With Best Wishes.

**Dr. George Issac**



## Dear FISATians,

I trust that you are taking care of yourself and your family well in this crisis time!

The Sixth Newsletter of FISAT reflects the passion and effort of FISATIANS during the pandemic period to advance ourselves with various technologies. This newsletter is a record of the untiring efforts of FISATIANS to focus on excellence. Along with the online classes, students and faculty were active with various activities like online discussions, workshops, seminars, cultural programs and laboratory works in a virtual environment.

Team FISAT has achieved the most enviable results as far as placements and academic results are concerned. The lucid vision of the institution under the true federal leadership of the Federal Bank Officers made FISAT one among the top five self-financing engineering colleges. Being a college with A Grade in NAAC accreditation and with the NBA accreditation for five branches, FISAT is now aiming at being an autonomous institution. Various challenges in the education field may arise in the post-Covid era due to the Industrial revolution 4.0 and the new National Education Policy change in engineering education. Changes are inevitable and the life we lead today is the result of the acceptance of change. To cope with the recent advancements, FISAT is stepping forward with a plan to start with four new emerging and interdisciplinary courses during this academic year. The change in line along with the new technologies by FISAT is commendable and is a step towards excellence. The effort taken by the Impetus team members towards publishing the events and happenings in FISAT is commendable and appreciable.

Wishing you all a smooth and effective academic year,

**Dr. Prasad J C**  
 Chief Editor



**Dr. Prasad J C**  
 Chief Editor



**Dr. Paul P Mathai**  
 Associate Editor



**Mr. Shinto Sebastian**  
 Associate Editor



**Dr. Anoo Anna Antony**  
 Associate Editor



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 CE



**Mr. Arun J Kulangara**  
 ME



**Mr. Vishnu Prasad**  
 Designer





# FISAT AT THE FINAL OF SMART INDIA HACKATHON CONGRATULATIONS!

Smart India Hackathon is a nationwide initiative of the Government of India to provide students a platform to solve some of the pressing problems we face in our daily lives and thus inculcate a culture of product innovation and a mindset of problem solving. A team of S8 EIE students Ms. Athulya Sreekumar, Mr. Yadu Krishnan K S, Mr. M Vishnu, Ms. Raichu Mary Mathew and Mr. Rishad of S8 CSE along with their mentor Ms. Raji P, entered as a finalist in the SIH software edition 2020 under the theme of student innovation for their project titled "PADSHACK". The team also got an opportunity to interact with the honorable Prime Minister of India, Shri. Narendra Modi during the finale. Prime Minister congratulated them for bringing up with such socially relevant projects.



## CONGRATULATIONS TO UNIVERSITY RANK HOLDERS



Ms. Athira S and Ms. Lakshmi Vijayan being honoured in the presence of Dr. George Issac (Principal, FISAT), Dr. P Anitha (Chairman, Governing body, FISAT), Dr. C Sheela (Vice Principal, FISAT), Dr. Sunny Kuriakose A (Dean, Academic & Administration, FISAT), Mr. Sunil Menon (PTA President, FISAT), Dr. Mini P R (Dean), management committee members and virtual presence of all students during the Induction Ceremony of the batch of 2020.

## FISAT LAUNCHES FOUR NEW PROGRAMMES

FISAT is all set to start one new B.Tech and three M.Tech programmes in emerging and interdisciplinary fields this academic year under Kerala Technological University. All India Council for Technical Education (AICTE), New Delhi has issued approval to commence courses at FISAT. The list of the approved courses are given below.

Courses	Number of Seats
B.Tech - Computer Science and Design	60
M.Tech - Artificial Intelligence and Data Science	12
M.Tech - Automotive Electronics	12
M.Tech - Renewable Energy	12

For more details read Page 5



## EIE DEPT. GOT FUND FOR SPICES FROM AICTE

Department of Electronics & Instrumentation received ONE LAKH RUPEES funding from AICTE-Scheme for Promoting Interests, Creativity, and Ethics among Students (SPICES) for department's Students Association, Instrumentation's Dextrous Etudiants Association (IDEA) for the year 2021-22. The objective of SPICES is to energize and position students club as facilitating entity for pursuit of individual interests, creative work, showcasing talent, networking and teamwork opportunities, social experience; organization and management skills, exposure to professional ethics etc. Department has planned year long activities for effective utilization of fund received for the benefit of students of FISAT as a whole. The proposal for funding were initiated by Dr. Abi Mathew, Ms. Sreevidya P and Mr. Anil Johny.



**Dr. ABI P MATHEW**

Board of Studies Member,  
 Electronics & Instrumentation,  
 APJ Abdul Kalam Technological  
 University.



**Ms. SREEVIDYA P**

- ◆ Board of Studies Member Instrumentation & Automation, APJ Abdul Kalam Technological University.
- ◆ Chairman, Board of Question Paper Setters Calicut University, Bsc Instrumentation).

## IDEA & ISA ACTIVITIES : PITCH ONLINE

“Ideas are easy. It's the execution of ideas that really separates the sheep from the goats.” The Association of EIE organized an online Idea Pitching competition on 20-05-2020 for both school and college students. It provided the



students an opportunity to prove the potential of their technical ideas. More than 30 students exhibited their ideas. Mr. S Sundararajan, Ms. Sreevidya P, Ms. Anila Mathew coordinated the event.

## EXPONENTS 2K20 - ONLINE PROJECT EXPO

The Department of Electronics and Instrumentation in association with IDEA organized the online expo of the final year projects on 13/07/20. The students of final year of EIE exhibited their project in the on-line mode. Ms. Beenu Riju & Sreevidya P were the staff Coordinators & Mr. Joe Paul was the student coordinator.





## UV 20- SANITIZING UNIT

A UV Sanitizing Unit that was designed and developed by Mr Ajay Baby and Jayasoorya J. S. (S8 EIE) under the guideship of Ms. Raji P (Asst. Professor, EIE) was donated by FISAT to Taluk Hospital, Angamaly on July 7<sup>th</sup> 2020. The device can be used for sanitization of N95 masks as well as the watches, phones etc used by doctors, nurses and the healthcare workers.



## ASSOCIATION DAY

The association day was celebrated on November 19<sup>th</sup> 2020 at 2 pm along with the farewell of S8 EIE students. A report on the activities conducted so far by IDEA during the academic year 2019-20 was presented & also the prizes of Best Outgoing Student & Student with academic excellence were announced during the event. The prize winners were Ms. Najla M.N. & Ms. Neenu S Bharathi respectively. They also shared their experiences with the juniors; which was a great motivation for them.



## EXPONENTS 2K21-DESIGN PROJECT EXPO& EVALUATION:

Exponents 2K21, an online design project expowas organized on January 14<sup>th</sup> 2021 to showcase the design projects done by the 2018-2022 batch. The event was inaugurated by Dr. Joe Elambasseril, Lecturer in Additive Laser Manufacture, RMIT University, Melbourne, Australia. He emphasized the importance of design projects & main projects in the career of an engineer. The evaluations of design project were done by the alumni Abin Rajan (2011-2015 batch), Anagha S Menon, Sreejith S Nair and Noufal M A (2012-2016 batch). The event was coordinated by Ms. Sreevidya P and Ms. Beenu Riju along with the student coordinator Mr. Bilal Ibrahim.



## INDUSTRY INTERACTION PROGRAM

As part of Industry Interaction program, a selected group of S7 EIE students along with faculty members Ms. Beenu Riju & Ms. Sreevidya P attended an Industrial Automation workshop conducted



by Inker Robotics, Thrissur on January 13<sup>th</sup> 2021. This workshop gave an opportunity for a hands-on session on PLC module and also provided an exposure to the concept of Industry 4.0.

## INTERNSHIP PROGRAM ON AUTOMATION AND PLC

An internship program of Ten days on Automation & PLC was conducted during the month of January 2021. This industry-oriented training program was conducted both in online and offline mode by Torkwell automation, a cochin-based automation and solutions company. The topics included PLC, VFD and introduction to SCADA. It was run for the 6<sup>th</sup> & 8<sup>th</sup> semester students were benefitted by the program. Ms. Sreevidya P was the coordinator of the program.





## COVID DASHBOARD

The covid dashboard was developed with an intention to give information regarding covid-19. A team of developers Mr. Derin T Thomas, Mr. Gokul Rejithkumar, Mr. Godson Thomas, Mr. Adarsh V. S, Mr. Agnel Nic Sebastian, Mr. John Paul Mankadiyan, S Haridev Sankar from S5 EIE were mentored by Ms. Sreevidya P to develop this platform that can be used by the public for getting the updates on corona virus infections on a daily basis. It also provides information on the number of positive cases reported in different districts in Kerala, nationwide and also globally. There are analytics on the spread, containment zones, death reported etc. <http://covidinfo.fisat.ac.in/>



## TECHNICAL DRAWING IN INDUSTRY

An online training class on technical drawings in industry for final year EIE students was conducted under the banner of ISA FISAT Student's Section by Theia New Consultancy LLP, Mumbai on April 24<sup>th</sup> 2020. The training was co-ordinated by Dr. Abi Mathew.



## INDUSTRIAL INTERACTION

An interactive session was organised with Mr. Babu Joseph Chirakkal, Managing director of Schnell Packing Systems, on March 29<sup>th</sup> 2021 with the faculty of Electronics & Instrumentation Department. The latest developments in automation of packaging industry were detailed and discussed during the meeting. The session was co-ordinated by Ms. Honey Devassy.



## SECOND POSITION IN VAIGA AGRI-HACK 2021

Our S5 EIE Students Ms. Reshma R, Mr. Derin T Jose, Mr. S Haridev Sankar, Mr. John Paul, Ms. Amrutha M with Ms. Sreevidya P as mentor participated in VAIGA-AGRIHACK, a State level competition organized by Government of Kerala Agricultural department from 11<sup>th</sup>-13<sup>th</sup> February 2021. They competed with more than 330 teams & acquired second position with a cash prize of Rs 75,000/- for their project "Vertical Profarm".





## PRIZES & RECOGNITIONS

### Project in Quarter Finals of International Competition HACKP

A project titled "S.A.L.T (Speed Analysis and Location Tracker)" entered in the quarter finals of an International competition HACKP organized by Kerala Police Cyberdome. The team members include Mr. Godson Thomas, Mr. Gokul Rejithkumar, Mr. Adarsh V.S, Mr. Derin T Jose, Mr. Agnel Nic Sebastian who were guided by Ms. Sreevidya P. They competed with a total of 110 teams to reach this position.



### 1<sup>st</sup> Position for TECH TRIBE 1.0 HACKATHON



Design Project "Sewage Water Treatment Plant For Pisciculture", done by Ms. Reshma R, Mr. Kiran Raju, Mr. Aswanth K & guided by Ms. Beenu Riju & Ms. Sreevidya P got first position (Open Innovation Track) among 94 teams who participated in a National Level

Project Competition conducted by Fountainhead School, Surat.

### INDIAN INTERNATIONAL SCIENCE FESTIVAL 2020

The design project titled "Sewage water treatment plant for pisciculture" got selected in the top Twenty finalists of Students Engineering Model Competition of India conducted as part of



Indian International Science Festival 2020. The team members include Ms. Reshma R, Mr. Kiran Raju, Mr. Aswanth K S6 EIE who were guided by Ms. Sreevidya P & Ms. Beenu Riju.

### TOYCATHON

Students of S6 EIE, Mr. John Paul, Mr. S Haridev Sankar, Mr. Derin T Jose, Mr. Godson Thomas, Mr. Gokul Rejithkumar, Mr. Abhishek Santhosh were the finalists in a National level project competition conducted by Central Government of India on March 21<sup>st</sup> 2021. They presented their product named "PIPO" a robocat which was mentored by Ms. Beenu Riju & Ms. Sreevidya P



### NOMINATED FOR LILAVATI AWARDS



Ms. Raji P(EIE) and Dr. Jiji Antony (CE) applied for the prestigious Lilavati awards conducted by AICTE in the sub theme "Women sanitation and hygiene" under women Empowerment theme. FISAT was the only engineering college from Kerala which applied under the theme & entered into the final ten teams nominated for the award. The team consisted of S8 EIE Students, Ms. Athulya Sreekumar, Mr. M Vishnu and Mr. Yadu Krishnan K S.

### OCTAHACKS 3.0

Design Project "Automated Cylinder Monitoring System (ACMS)", done by Mr. Godson Thomas, Mr. Ajith Joseph, Mr. Bilal Ibrahim,

Mr. Anandkrishnan U & guided by Ms. Beenu Riju & Ms. Sreevidya P got 12<sup>th</sup> position among 450 teams who participated in a National Level Project Competition conducted by Google Developer Students Clubs & Chitkara University.



### PRODUCT-A-THON

Students of S6 EIE, Mr. Derin T Jose, Mr. John Paul, Mr. Godson Thomas participated in PRODUCT A THON, a National level competition organized by IIIT Delhi. They

competed with 200 teams and secured ninth position for their project "Brain Computer Interface Based Nursing Bed". Ms. Sreevidya P & Ms. Beenu Riju guided the project.



### GUINNESS WORLD RECORD EVENT

Ms Lakshmi Nandakumar and Ms Shruthi Bhaskaran had participated in the Guinness World Record Event 2021 conducted by GUVI and AICTE on "AI for India - most users to take an online computer

programming lesson in 24 hours" from April 24<sup>th</sup> 2021, 6pm to April 25<sup>th</sup>. Three students from S4 EIE also took part in the event.





## RESEARCH PUBLICATIONS

### Ms. Sreevidya P

#### Book Chapters

- ◆ “Performance Analysis of NASNet on Unconstrained Ear Recognition: Studies in Nature Inspired Computational Intelligence”, SpringerLink, [https://doi.org/10.1007/978-3-030-33820-6\\_3](https://doi.org/10.1007/978-3-030-33820-6_3), Jan 2020.
- ◆ “Compressive Sensing-Aided Collision Avoidance System: The Cognitive Approach in Cloud Computing and Internet of Things Technologies for Surveillance Tracking Systems”, Elsevier, March 2020.

#### Journals

- ◆ “Sentiment analysis by deep learning approaches”: TELKOMNIKA, DOI: 10.12928/TELKOMNIKA.v18i2.13912, 2020 April.

#### Conferences

- ◆ “Machine Learning-Based Early Landslide Warning System using IoT”: IEEE & IAS sponsored 4th Biennial Conference on Nascent Technologies at Fr. Rodrigues Institute of Technology, Vashi, Mumbai, January 2021.
- ◆ “Lidar Based Lane-change Assistance For Motor Vehicle”: 2021 7th International Conference on Advanced Computing & Communication Systems (ICACCS), Sri Eshwar College of Engineering, Coimbatore, March 2021.

### Ms. Honey Devassy

“Exploiting The Non-uniform Characteristics Of Silicon Photodiode For Vibration Monitoring”, :DOI: 10.1109/CICT51604.2020.9312092 2020 IEEE 4th Conference on Information and Communication Technology, Indian Institute of Information Technology Design and Manufacturing Kancheepuram, December 2020.

### Ms. Raji P & Ms. Lakshmi Nandakumar

“Real Time Water Contamination Monitor using Cloud, IoT and Embedded Platforms”, DOI: 10.1109/ICOSEC49089.2020.9215276. 2020 International Conference on Smart Electronics and Communication (ICOSEC), Trichy, India, September 2020.

### Dr. Anish Mathew K

“Sustainable Development – Concept, Meaning and Strategies”, Book - People and Environment: Concerns and Challenges, ISBN: 978-81-908006-4-8

## STUDENTS ACHIEVEMENT



#### Mr. Godson Thomas

- ◆ First position in a state level project presentation competition for the design project “Automated Cylinder Monitoring System (ACMS)” conducted by SAINTGITS College of Engineering, Kottayam.
- ◆ Got internship offer letter as Robotics Developer for two months with a stipend of Rs. 2000, in RoboSlog Company (New Delhi based), one of the prominent leading suppliers for all kinds of Robotics and Automation Services.



#### Mr. Gokul Rejithkumar

Published a paper on “Machine Learning-Based Early Landslide Warning System using IoT”: IEEE & IAS sponsored 4<sup>th</sup> Biennial Conference on Nascent Technologies at Fr. Rodrigues Institute of Technology, Vashi, Mumbai, 2021 January.

### CAREER GUIDANCE CELL

The career guidance cell of EIE department was inaugurated on April 10<sup>th</sup> 2021 by Dr. UnniKartha G, Placement officer, FISAT. This was followed by a talk by Mr Sandeep of Pragmatix learning on resume preparation. The talk was attended by students of eight and sixth semesters. The talk was very engrossing and many students actively participated in the program. The program was coordinated by Mr. S. Sundararajan





## FACULTY ACHIEVEMENTS

### Ms. Sreevidya P

- ◆ Toycathon 2021 Evaluator, School category organized by Ministry of Education's Innovation Cell with support from All India Council for Technical Education, Ministry of Women and Child Development, Ministry of Commerce and Industry, Ministry of MSME, Ministry of Textiles and Ministry of Information and Broadcasting.
- ◆ Selected to be a part of NPTEL Text translation project, an initiative by MHRD
- ◆ Mentor: Control System, NPTEL course conducted by IITM for guiding 3 students to get Elite score.
- ◆ Resource person: Talk on Outcome Based Education, KMEA College of Engineering, Edathala.



### Ms. Raji P

- ◆ Received Grant of Rs 25000, in the area of Health Care from Harvard Medical School and Boston Children's Hospital for her research work.

◆ Toycathon 2021 Evaluator, School Category organized by Ministry of Education's Innovation Cell with support from All India Council for Technical Education, Ministry of Women and Child Development, Ministry of Commerce and Industry, Ministry of MSME, Ministry of Textiles and Ministry of Information and Broadcasting.

◆ Best Paper Award: "Machine learning based diagnosis of diseases associated with abnormal and heavy menstrual bleeding: A Literature Review" in the International Conference on Novel Approaches and Developments in Biomedical Engineering - ICDNABE 2021 Organized by the Department of Biomedical Engineering of Karunya Institute of Technology and Sciences, Coimbatore during April 22<sup>nd</sup> and 23<sup>rd</sup> 2021.

◆ Special mention award & Cash prize of Rs 10,000 under the theme "women security", in She power Hackathon conducted by Kerala Start up mission and US State Government.



### Ms. Lakshmi Nandakumar

- ◆ Scored 96% (All India 1st Rank and Gold medal) for the NPTEL course "Cloud Computing" conducted by IITK. She also received the top performing mentor award for this course in which 2 of her students were also among top 1% and 5% respectively.
- ◆ Received Mentorship certificate for the 12 weeks NPTEL course "Deep Learning" conducted by IITK for guiding all her mentees to get 100% pass for the last seven consecutive years.
- ◆ Selected to be a part of NPTEL Text translation project, an initiative by MHRD. She received an honorarium amount of Rs. 15000 and was recognized and certified by NPTEL and MHRD for her contributions towards Instrumentation course.
- ◆ Received special mention award & Cash prize of Rs 10,000 under the theme "Women Security", in She power Hackathon conducted by Kerala Start up mission and US State Government.



### Ms. Beenu Riju

◆ Appointed as National Service Scheme (NSS), Program Officer (PO), Unit No.568, APJ Abdul Kalam Technological University.

◆ Part of Process Control & Dynamics

Syllabus Revision Committee, 2019 Scheme, APJ Abdul Kalam Technological University.



### Ms. Honey Devassy

Best Paper Award: "Exploiting the non-uniform characteristics of silicon photodiode for vibration monitoring", IVth IEEE Conference on Information and Communication Technology, IIITDM, Kancheepuram December 3-5, 2020.

## PROGRAMMABLE LOGIC CONTROLLER (PLC) TRAINING LIVE WORKSHOP

The training on Programmable Logic Controller was organized by the IDEA association from 22<sup>nd</sup> - 24<sup>th</sup> August 2020. Mr. Shinto Sebastian, resource person for the program, provided the fundamentals of the PLC through the ladder logic programming techniques. The students from the various batches of Electronics & Instrumentation Engineering, Electrical Engineering and Electronics and communication Engineering were part of this program. The external participants from various other colleges made use of this program for developing their programming skills of PLC. Mr. S Sundararajan, Ms. Sreevidya P, Ms. Anila Mathew coordinated the event.

## PYTHON PROGRAMMING WORKSHOP

It was conducted by the IDEA, Association of EIE department to bridge the gap in the KTU syllabus. The training on "Python Programming" was delivered by Ms. Lakshmi Nandakumar, Asst. Professor of EIE department during August' 13<sup>th</sup> and 14<sup>th</sup> 2020. This program was intended to provide the platform for the second-year students of EIE to learn the fundamentals of Python.



## ALUMNI INTERACTION PROGRAMS



**Ms. Neethu TP** (R & D, ABB)

Ms Neethu TP is an alumna of 2008-2012 batch. She chatted with the students of S5 EIE (2018-2022 batch) on her extensive knowledge and vast experiences in the field of embedded

systems and real time applications. The mentoring sessions spanned around 20 hours. The sessions were coordinated by Ms. Sreevidya P



**Ms. Haritha Ravichandran**, Software Engineer, Wipro

Ms. Haritha Ravichandran is an alumna of 2015-2019 batch and the final year students and an online meet was held on 30th December 2020 She spoke to the Wipro aspirants on how to crack the aptitude test and also tips to attend the interview. She also spoke about her experiences and how well EIE students can adapt to software field even though from a different background. The program was organized by Ms. Lakshmi Nandakumar.



**Mr. Harigovind**, Junior software Developer, Perfectfit systems Pvt. Limited. Kalamassery

Harigovind is an alumna of 2016-20 batch and an online meet was held for the s7 students on December 16<sup>th</sup> 2020. He explained about the career opportunities of an instrumentation engineer and how this multi disciplinary branch helped him to get into a software field. He encouraged the students to attend a maximum number of MOOC courses which will help them to start the career in a better way. The alumni meet was co-ordinated by Ms. Honey Devassy.



An online meeting of Mr. Jijo and Mr. Rubaan N R, alumni of 2015-2019 batch and the final year students were held on 26th March 2021 under the career guidance cell. They gave an insight into the life of an instrumentation engineer and the expectation that the students can have. The program was coordinated by **Ms. Honey Devassy, Ms. Sheffy Thomas and Ms. Ambily John.**

**Ms. Diya Thampi**, Systems Engineer, Infosys

An online meeting of Ms. Diya Thampi, alumna of 2015-2019 batch and the final year students was held on March 21st, 2021 She spoke to the Infosys aspirants on how to attend the interview. She also spoke about her experiences about working in Infosys and about the training received at Infosys campus. The program was organized by Ms. Lakshmi Nandakumar

**Mr. Joseph S Padayattil**, Senior Instrumentation engineer, YOKOGAWA. Middle east.

interacted with students of the EIE department on 13th April 2021 about his vast experience in instrumentation field. During the session he elaborated students about the importance of calibration and troubleshooting analytical instruments in critical operations of petroleum industries. He also described the principle and operation of few analytical instruments which are commonly used in process industries. The webinar was co-ordinated by Mr. Anil Johny.



**Ms. Arathi E, Mr. Arun U**, Software Engineers, Limentzy Technology

Ms. Arathi E and Mr. Arun U are alumni of 2014-2018 batch and they interacted with 2016-2020 batch students on November 15th 2020 They spoke about how to bag a career in software field from their personal experiences. They detailed on the relevance of LinkedIn profile and final year projects in getting off-campus placement. The program was co-ordinated by Ms. Lakshmi Nandakumar.



**Meghna M**, Junior Developer, Grozit enterprise Pvt. Ltd. Perumbavoor

An online alumni interaction was held for the final years on November 18th 2020. She talked about the importance of registering in various national schemes like NATS and NAPS etc which will open up opportunities to equip them technically with practical knowledge required in their field of work. Also, she encouraged the students to do online courses in PLC which will help to start a career in instrumentation and automation fields. The alumni meet was co-ordinated by Ms. Honey Devassy.





## ACADEMIC TOPPERS

2016-2020 BATCH



**NEENU S BHARATHI**  
CGPA: 8.63



**NAJLA M N**  
CGPA: 8.41



**AMIT A BASTIAN**  
CGPA: 8.4

2018-2022 BATCH



**CLINTO JOSE**  
CGPA: 8.68

2017-2021 BATCH



**ATHULYA SREEKUMAR**  
CGPA: 9.00



**AKASH ANIL**  
CGPA: 8.43



**JITHU TOMY**  
CGPA: 8.38



**AARON SABU JOSEPH**  
CGPA: 8.41

2018-2022 BATCH



**DERIN T JOSE**  
CGPA: 9.14



**GOKUL REJITHKUMAR**  
CGPA: 8.95



**RESHMA R**  
CGPA: 8.87



**LEON JOSEPH**  
CGPA: 8.35

## LATEX WORKSHOP

LATEX, a document preparation system for producing professional-looking documents was conducted by the IDEA association for the students of various batches of EIE, ECE department. Dr. Parvathy R (HOD EEE) was invited as the resource person for the workshop in on-line mode using the OVERLEAF latex editor from August 10th-12th 2020. The workshop feeds the input to the students on publication of scientific documents through LATEX. Mr. S Sundararajan, Ms. Anila Mathew were the workshop coordinators.



## ORIENTATION PROGRAM

An orientation program for first year EIE students was conducted to familiarize them with the department, its scope and to interact with the alumni. An idea about outcome-based education was also given to them. The program included the following.

- ♦ Sessions on:
  - “Familiarization with Instrumentation”, Mr. S. Sundararajan
  - “Job Opportunities in Instrumentation”, Dr. Abi P Mathew
  - “Outcome Based Education”, Dr. Abi P Mathew
- ♦ Alumni Interactions by
  1. Ms. Neenu Bharathi (Product Specialist, BYJU's)
  2. Mr. Harigovind KA (Junior Software Developer, Perfectfit Systems)
  3. Mr. Arjun PS (System Engineer, Intertec Group, Qatar)
  4. Ms. Sikha Gireesh (Assistant Systems Engineer, TCS)
  5. Mr. Mohammed Aflah (Integration Lead, International System Est.)



## NATIONAL LEVEL QUIZ PROGRAMME BRAINWAVE 2021

The first version of the National level management quiz program BRAINWAVE 1.0 was conducted in 2018 in FISAT campus in association with FORUM 2K18 the National level Management Fest of FISAT Business School. A resounding success, Brainwave 1.0 was one of the best events of FORUM 2K18 which received all round appreciation. Some of the Highlights were online views exceeding 46000, total Registrations numbering 408 and the number of teams enrolled were 204.



This year BRAINWAVE 2021 was held on May 8th 2021 at 7pm IST and featured some of the best colleges across the country. With a cash prize of Rs 25000 for the winners and Runners-up prize of Rs 10000, the competition invitation was viewed by approximately 30,000 persons and had a registration of 350 teams in the initial online round. The National event was coordinated by Dr. Sindhu George & Mr. Prasanth V, Assistant professors MBA Department.



Powered by the Federal Bank with a generous sponsorship and promoted extensively by the student and faculty fraternity, it was a nail biting finish with 6 top teams from top institutes of management fired to the finishing line by the amazingly talented Major Chandrakant Nair, Quizmaster par excellence.

## QUINTESENCE 2020

QUINTESENCE 2020 - A Young Talent Talk series initiated by the Forum of Management Students (FMS) council was a five day event conducted from December 14th to December 18th, 2020 coordinated by Dr. Delma Thaliyan and Dr. Sindhu George. The event was designed to stir up the youngsters who were yet to fulfill their management aspirations with an ability to identify, acknowledge and honour their unique life purpose by a deep and honest interaction with persons from different career backgrounds who had known success and failure. It was a learning platform for Gen Z (colloquially known as Zoomers) to address their professional needs, goals and aspirations. The event witnessed the active participation of students from 18 other colleges.



- Day 1** - Mr. Sachin Warriar- a distinguished alumnus of FISAT and playback singer and composer for the Indian film industry, he spoke about the process needed to reach the goal- how focusing on this automatically lead to success.
- Day 2** - Mr. Vijay S Pul is a content strategist, communication consultant, blogger, speaker and businessman. He spoke about how failures were necessary to reach any kind of success and self realization was the most necessary goal.
- Day 3** - Dr. Manu Melvin Joy, Assistant Professor, School of Management Studies spoke of VUCA and the need to adapt to it, as well as the need for continuous learning in difficult times.
- Day 4** - Mr. Ranjith Sankar is a Malayalam movie director and producer. He spoke to students on the theme of self belief, working on mistakes with a never-say –die spirit and continuous efforts.
- Day 5** - Mr. Rahul R Lakshman, Assistant Professor XIME Kochi, was the speaker for the final day. A play back singer and passionate musician who is also a FISAT alumnus. His directive was that today's action define to tomorrow's direction and we must be able to control or anchor our lives.



## INDUSTRY INTERACTION SERIES

Industry Interaction Series is regularly organized by FISAT Business School to expose students to the real-time challenges and opportunities in business and management. This is achieved by inviting industry experts to the campus to interact with our students. Even during the pandemic, it was ensured that the series was carried out as usual, except that the same was conducted in the online mode.

### EXPERT SERIES 1: WORLD OF SURVIVORS TO WAVES OF OPPORTUNITIES (September 21, 2020)

The students at FBS were fortunate to have an interaction with Ms. Rajasree Shenoy (Head HR, TATA Consultancy Services, Kochi). She gave an overview of the impact of the pandemic on the functioning of organizations and introduced the students to the strategies that the organisations adopted to sustain the changed scenario. Ms. Rajasree talked about the skills that a person will need in the post-COVID scenario and also listed some skills that would turn obsolete due to the on-going transition. She briefed on grooming before getting hit by the corporate waves.

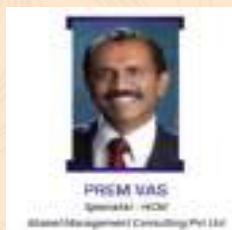


### EXPERT SERIES 2: DISCOURSE ON STRIKING A BALANCE IN THE NEW NORMAL (October 17th, 2020)

The students at FBS had the opportunity to be part of a highly interactive session with Mr. V.A. George (Managing Director, Thejo Engineering Ltd., Chennai). The interaction focused on pursuing one's professional goals by simultaneously holding on to the underlying principles of humanity. He explained how one should shift the perspective from individualistic behaviour and start thinking of other fellow beings. He also urged us to realize how blessed one is when compared with the underprivileged sections of the society. He further highlighted that the current hiring practices follow the motto - 'Hire for Attitude, Train for skills' and hence students should inculcate the habit of continuous learning.

### EXPERT SERIES 3: INDUSTRY FIT - TIPS AND TRICKS (October 31, 2020)

Mr. Ashwin Muralidharan (Head of Tax, IMEA and Deployment Manager, Henkel, UAE) shared a wide variety of Industry Fit - Tips and Tricks, intending to help students excel in today's corporate world. Various aspects such as different contexts of culture and its relevance, essential corporate skill sets required to boost one's career, business internationalization in the modern world, and much more were discussed. Students also had the opportunity to clarify their doubts and concerns, through a fun and interactive Q&A session.



### EXPERT SERIES 4: DISCOURSE ON HOW RECRUITERS SELECT THE RIGHT CANDIDATE

Mr. Prem Vas, Specialist - Human Resource Capital and proprietor of Abel Management Consulting Pvt Ltd gave an online session on January 22nd 2021. It was on what recruiters look for in a job aspirant and how does one go about trying to achieve those skills and abilities. Associated with the National Institute of Personnel Management (NIPM) and with years of experience in assessing human skills necessary for superior candidature, he was able to enlighten the senior batch students and clarify their doubts.

## FISAT DIGITAL DISCOURSE SERIES II- MANAGING THROUGH THE PANDEMIC IN THE WORKPLACE – CHALLENGES IN TALENT ACQUISITION AND TRAINING

The second event under FISAT Digital Discourse Series was a webinar on Challenges in Talent Acquisition and Training which was conducted on August 20, 2020. The key resource persons of the webinar were Mr. Gopinadhan K.G. (Client Director, EMA – Partners, Bangalore), Ms. Reeja George (Head, Talent Development, TCS, Kochi), and Dr. Dony Peter (Lead Solution Specialist, Toyota Motor Corporation, Australia). The moderator for the webinar was Dr. Chandrasekhar (Management Consultant and Business Analyst). The webinar provided a platform for FBS students to interact with eminent resource persons from the industry and helped them to gain a real-world view on how the different industries have adopted strategies to tackle the pandemic and at the same time keep their workforce motivated.





## ONLINE INAUGURATION OF MBA 2020-22 BATCH

Ms. Surya Ramkumar (Business Group Head, Modern Work and Security, Microsoft, Dubai) virtually inaugurated the MBA Batch 2020 on September 9, 2020. She ignited the young business minds with her Inaugural address on the confluence of unexpected events that have impacted our health, economy, ways of working, and learning. Her address expressed the need for strong, courageous, and caring leaders to establish the necessity of professional management education. She shared throughout her speech about four secrets namely courage, curiosity, care, and creativity. Ms. Surya advised the students to discover the inner child in themselves and explore the world at large. Her oration concluded with a piece of advice to future leaders to care for society and to have a purpose-driven life.



## Release of FBS Journal Forum – South Asian Perspectives on Management and Social Sciences

With a constant desire to present current management thought to the teaching and learning community, FORUM journal with ISSN number looks at the most contemporary perspectives driving social science research initiatives. Through the online International Conference COLLOQUIUM: a Post Pandemic Business and Institutional Implications: An Exploration by Corporates and Academics held on July 28, 2021 that received about forty paper requests and presentations carried out on a virtual platform, a small number of papers were chosen for publication based on author willingness and paper quality. Narratives of the key note speakers will be presented in the coming issues as well as has been done here. We are proud to present the Vol 4 Issue 1 of FORUM with the following papers:

1. Macroperspectives: Narratives on Economic implications of COVID 19- How can Businesses adapt and capitalize from the new norms by Mr. Thomas Kuruvilla, Strategic Planning Division, Arthur D little, The Middle East
2. Macroperspectives: Post COVID Recovery for Businesses Using Circular Economy Principles Sudeepa S. Nair, Consultant, Design Thinking Strategist, Singapore
3. Macroperspectives: The Pandemic Covid-19 and Its Impact on Travel and Tourism Industry by JanisbenBinoand GreeniT. Thankachen, Faculty, UC College
4. Concepts in Practice: Impact of COVID Pandemic on the Learners of Professional Courses Noor ul Huda, Assistant Professor, Ghulam Ahmed College Of Education Hyderabad, Telangana, India
5. Concepts in Practice :Impact of Covid 19 On The Retail Sector Of The Economy Josh Varghese, Judy Rajanand. Prof Juby Thomas, SAINTGITS College of Applied Sciences
6. Concepts in Practice :Impact Of Covid 19 In Education Sector Ms. Anina B. Kottaram, Telma George and Mrs. Juby Thomas, SAINTGITSs College of Applied Sciences
7. Research Innovations: Scrutinizing the effectiveness of digital devices in online teaching in Covid 19 learning environments: Aiswarya Suresh & Pranav Raj, SAINTGITS College of Applied Sciences
8. Research Innovations: A Study on Financial Freedom of Transgenders in Cochin Corporation Region Radhika G.S. Sacred Heart College, Thevara
9. Book Review: Thank You For Being Late: An Optimist's Guide to Thriving in the Age of Accelerations. By Thomas L. Friedman-SamojPanicker, Head, Compliance & Surveillance, Standard Chartered Bank, Singapore



## Ice Breaker and Orientation Program for MBA Batch 2021

PRAGMATIX Learning Resources conducted an Orientation and Induction program on February 27-28, 2021. It was designed to support the students with their learning and to maximize their opportunities to start forming a network with their classmates and batch mates and build long term relationships. The aim was to pass on a message that they will achieve more collaborating as a group than competing as individuals. The following areas were covered in this course;

- ❖ Ice Breaker & General Motivation
- ❖ MBA Orientation
- ❖ Critical & Creative thinking
- ❖ Smart Goal Setting



### Orientation for MBA 2020 Batch - “i Am The Future”- How To Prosper as an MBA Graduate

Dr. Zakkariya K. A (Director, DDU Kaushal Kendra, CUSAT & Chairman, ISTD Kochi Chapter), briefed the students on how to develop a clear-cut understanding of the importance of pursuing an MBA on November 21, 2020. He encouraged students to aspire for a career and not limit them to just grabbing a job. He stressed the importance of self-awareness and stated the significance of amalgamating hard work and homework to prosper. Further, he explained how creativity and thinking are the most sought-after skills in this world where cut-throat competition is apparent and that these have an inevitable role in decision making all along one's career.



### INAUGURATION OF FMS 2020-21

The first and most important event was the inauguration of the FMS. This was done by Dr. SujaKarthika- well known actress, motivational speaker, trainer and founder- Excellor training, on November 2, 2020. She conveyed the need to be self-motivated and that only hard work can pave way for self-development and accomplish the ambitions of one's life.. She presented her views with stories demonstrating the need to strengthen one's abilities and emphasized that failure is an opportunity to reevaluate and bounce back stronger.



### Impressions Matter: An Interactive Session on Essentials of Etiquette and Professional Grooming

To introduce the young MBA aspirants into the finer aspects of management orientation, a session on the importance of etiquette and professional grooming was conducted on January 16 2021 with the expert inputs from Ms. Jaicy George, faculty in Department of Professional studies, Christ University Bangalore and a motivational speaker, life skills coach and facilitator.



### ACTIVITIES CARRIED OUT BY FMS 2020-21

Some of the lighter events carried out by FMS were

- ◆ Onam celebration “Melam”:-Due to the pandemic, the Onam celebration was conducted in online mode on August 29, 2020. Various cultural events like Pookalam competition, Group dance, Solo song, Malayali Manka and Purusha Kesari were conducted.
- ◆ Poster Making competition: In connection with Gandhi Jayanti, a poster making competition was conducted on the topic 'Atma Nirbhar Bharat' in which thirty students participated.
- ◆ Handwash Day- Social distance and personal hygiene being the need of the hour a photography competition on students photographic presentation of this concept was carried out with Mr. Josekutty Panackal, Chief photo-journalist of Malayala Manorama being the judge.
- ◆ Kudos to the seniors for even organising a 'Freshers Day' for the batch of 2020, extending a warm welcome to their juniors and a variety of entertaining programs to pull their legs on October 23rd 2020.
- ◆ A digital idea pitching event to provide a platform for the students to exhibit their innovative business ideas and to develop and improve presentation skills and team performance was executed. Held in two rounds, four teams were shortlisted out of eight for presentation to a virtual panel comprising Mr. Brijesh Pottekkatt (GM, Intl sales, G- Surgiwear) and Mr. Raghav Swaminathan

### CPFS CERTIFICATION FROM HEDGE TECHNOLOGIES

Finance Elective students received a thirty hour training on wealth management and financial planning fundamentals delivered through the organization Hedge Technologies that covered areas like fixed income securities, equity analysis and capital markets, alternative assets and tax planning. 59 students undertook the training in remote mode and underwent the examination conducted by an external body for CPFS Certification. They have successfully completed the program.





## ADD ON PROGRAMS OFFERED TO MBA STUDENTS

### CERTIFICATE COURSE IN Microsoft Power BI

As part of the upskilling initiatives for MBA students to make them job ready and prepared for future technology requirements a forty



hour program in POWER BI was conducted in online mode for Marketing, Operations and Human Resource Elective students with the

resources of CAPRED Technologies, CALICUT. Selected through an online assessment of capabilities from a number of vendors, they delivered the program over ten weeks in four hours per week that included theory and hands on lab sessions for operations. A final assessment was done and a working knowledge of Power BI has been achieved.



### FBS ALUMNI SPEAK

Hello!

Apart from the finest quality of education, FBS has provided me with an abundance of opportunities to build a successful career. The college equipped me with people skills which helped me stand out in my corporate role. Being guided by excellent mentors, ensured that learning was fun at every stage. The robust placement cell played a pivotal role in bringing top MNCs for campus recruitment. These 2 years were a perfect blend of happiness and learning! Choosing FISAT was one of the best decisions that mould me into who i am today! Always proud to be a FISATIAN!



Sangeetha , Level 2 Tax Associate, KPMG  
 MBA 2017-19

### “I Am the Identity”- Designing A Resume That Stands Out

An online resume-building exercise was carried out by Mr.Prasanth V., Assistant Professor, FBS, for job-seeking MBA students from marketing specialization on November 27, 2020.



### Training For Fisat Staff

In order to improve the managerial grounding of FISAT Staff, a first attempt at imparting professional training to them was carried out. Titled 'Improving Understanding of Trends, Patterns, approaches and Concepts of HR', and conceptualized by Dr. Delma Thaliyan it covered modules like HR attitude development and approaches, Tax planning and filling in online mode, official communication methods and record keeping and PF and ESI rules and application. The HR Department comprising Ms. Renju, Ms. Manjusha and Mr. Jomgee received training for ten hours. Faculties were Dr. Delma Thaliyan, Dr. Dhanya Alex, Dr. Anoo Anthony and Mr. Praveen V.

### IBM SPSS Training for T6 MBA Students for Final Project Statistical Analysis

In keeping with the need to constantly upgrade the quality of MBA problem centered projects that is a major component in the final trimester of the MBA Program, SPSS hands on training has been meted out to students from 2013 onwards. It has covered basic operations and procedures as well as an emphasis on the logic behind the operations. Specific descriptive and inferential statistical tools are also taught keeping in mind the students need. In July 1-4, 2020 and May 24-27, 2021, a ten hour hands on SPSS training in online mode, was carried out with inputs from Dr Sindhu George, Dr Jose Varghese, Dr Dhanya Alex and Dr Anoo Anthony



### Placement Overview

For the Batch MBA 2018-20, placements initially were limited as it was the year that COVID started and the effects were multiplied. Companies were still in a process of trying to understand how to operate through the pandemic. This slowly was overcome as recruitment rose and online work options, work from home, and gig based work operations started. Currently in this batch out of 120, 84 or more than 70 % have received offers with salary offers ranging from 5.5 to 10 lakhs. In the Learning technology and IT sector about 28 offers, insurance and auditing sector about 26 offers, banking sector 18 offers and Infrastructure and Retail about 12 offers.



## FACULTY ACHIEVEMENTS

Dr. Delma Thaliyan - Ph.D. in Management awarded by Bharathiar University, Coimbatore for the thesis titled 'Modelling the influence of psychological meaningfulness on employee retention among Indian Y Gen IT employees.' (September 2020)



Dr. Dhanya Alex - Resource person for a two-day training program on Research Methodology at Sahridaya College of Advanced Studies, Thrissur (October 16, 2020 and October 19, 2020).

## ENVIRONMENT DAY INITIATIVE BY FMS IN ASSOCIATION WITH NSS FISAT-REIMAGINE. RECREATE. RESTORE.

FISAT Business School carried out a programme to commemorate Environment day through the students association FMS (FORUM for Management Students). Three events were carried out on May 5, 2021.

**1. Chellanam Project** – the aim was to highlight the resilient and resourceful people of Chellanam who helped and extended their support to fight the Kerala flood of 2018. In the event of their great hardship during the cyclone, two weeks provisions worth Rs 20000 were supplied to the Chellanam community kitchen which provides food for camps in the area to aid in their repatriation and temporary settlement.



**2. Greening and spot fixing** activity in coordination with NGO Plan at Earth-10 student representatives of FISAT Business School in coordination with NGO Planet Earth took part in greening and spot fixing activity for the police stations of Angamaly and Aluva.

**3. Tree planting drive** - Requesting FBS teachers and students to plant a tree and send a photo of it on 5th of June. At least 200 students of FBS took part in the drive. The environment day initiatives were inaugurated by Shri Roji M John, MLA in the Presence of SHO Shri Anoop Jose, faculty coordinators Dr. Delma and Dr. Sindhu and student representatives of FISAT led by Mr. Harikrishnan, President, FMS.



## PUBLICATIONS & PAPER PRESENTATION

- ◆ Dr. Dhanya Alex: Exploring dependencies among corporate social responsibility, attitude towards brand and purchase intentions. Zeichen Journal (Scopus Indexed, UGC Care list ISSN: 0932-4747, Vol.6, Issue 9, September 2020)
- ◆ Dr. Dhanya Alex: Book chapter titled "Culture's consequences on Communication patterns" - in the book 'Hospitality and Tourism - Emerging Practices in Human Resources Management' (ISBN 978-81-949793-6-4) (Bharti Publishers, National Publisher for Higher Education, New Delhi)
- ◆ Dr. Dhanya Alex: Book chapter titled "Strategies for Effective Cross-Cultural Communication in Work Place" in the book 'Dynamics of Culture and Communication at Workplace' (ISBN- 978-81-946799-8-1) (Upanayan Publications, New Delhi, India)
- ◆ Dr. Sindhu George – Published the paper titled 'Perceptions of Service Quality and Behavioural Intentions: A moderation effect of investment expertise of retail mutual fund investors' in STRAD Research, Vol 7, Issue October 10, 2020 (SCOPUS indexed).
- ◆ Dr Sindhu George – Co authored a Cochin University Book Publication brought out by School of Management Studies, titled 'A Study on Marketing strategy for Hydrogen Peroxide as a Disinfectant' on behalf of Hindustan Organic Chemicals Limited (HOCL), Kochi in February 2021

## TALK ON OBE IN MANAGEMENT EDUCATION

FISAT business school carried out a professional development program with the resource person Dr. Gabriel Simon Thattil, Professor, Kerala University-Department of Business Management 'Outcome Based Education Principles in the Framework of NBA as Relevant to Management Education Institutions. It was attended by college faculty members in particular the MBA AND MCA department and gave a lot of insights into how the NBA Certification requirements may be implemented in management streams. It was carried out on June 19th, 2021.

## SEBI-IEPF SPONSORED SEMINAR

The finance specialization students of FBS attended SEBI-IEPF sponsored webinar on "How to buy, sell and value shares in Stock Exchanges?" on May 20th 2021 which focused on Live Markets watch and trading, technical analysis, fundamental analysis, the important factors and metrics for due diligence, running an accounts and the post trade aspects. The second series of the SEBI-IEPF sponsored webinar was held on May 27th 2021 on "Introduction to Mutual Funds and ETF investing". The webinar focused on the organization and classification of mutual funds, its risk-return trade off and on how to invest in the same. The resource person for the webinars was Er. Amit Gupta, SEBI empaneled Securities Markets Trainer.



## AGNITIO 2K20

The Department of ECE hosted the annual Project Exhibition- AGNITIO 2K20 in virtual mode on 16<sup>th</sup> July 2020. It showcased the main projects of final year students. The Chairman of FISAT, Dr. Anitha P inaugurated the event and delivered her message to the outgoing students. The event was felicitated by Dr. George Issac (Principal), Dr. C Sheela (Vice Principal), Dr. Sunny Kuriakose (Dean, Academic & Administration), Dr Mini PR (HoD, ECE) and Mr. Anoop E G (Staff in charge, ECHO). The winners of the award for the best outgoing student and the Hima Memorial Endowment awards were also announced.

### DEPARTMENT EVENTS

#### MOU with Luure.ai

The Electronics & Communication Engineering department, FISAT, has signed a Memorandum of Understanding (MoU) with Luure.ai on the 1st day of July 2020. Luure.ai is an LLP company incorporated under Govt of India and having Corporate Offices at Amstor building, Technopark, Trivandrum. Luure.ai is actively engaged in providing Artificial Intelligence based solutions and has offered to support FISAT in the following areas:

- ◆ Impart training and skill development programs for students and staff.
- ◆ Impart internship for selected UG and PG students on live projects based on interview and availability of the projects at luure.
- ◆ Association on joint consultancy works.
- ◆ Faculty support from luure on specific topics in the syllabus.
- ◆ Impart training for FISAT staff on latest technologies available at luure.
- ◆ Impart long term training for FISAT students to enhance employability without affecting FISAT regular class timings.

#### FDP ON MENDELEY

Department of ECE, FISAT organized a Faculty Development Programme on 'Reference Management Tool - Mendeley' on 28<sup>th</sup> Jan 2021 in online mode. Mendeley Reference Manager is a free web and desktop reference management application, which helps to organize references and easily manage PDF documents.

#### FDP ON 'BASICS OF PROGRAMMING IN PYTHON'

Department of ECE, FISAT in association with the ISTE chapter, FISAT organized a two-day workshop on 'Basics of programming in Python' on 20<sup>th</sup> and 21<sup>st</sup> of Jan 2021 in Offline mode for faculty members of FISAT. The resource person was Mr Pankaj Kumar. G, Assistant Professor, CSE Department, FISAT.

#### ONLINE CHRISTMAS CELEBRATIONS

Christmas celebrations were conducted online for all semesters on 18<sup>th</sup> Dec 2020. All students of various semesters and their

teachers actively participated in the celebrations. The students exhibited their talents and shared the joy of Christmas with all.

#### TALK ON 'CHANNELIZING YOUTH POWER TO BUILD THE NATION TALK'

Electronics and Communication Heuristics Organization (ECHO) in association with IEEE FISAT SB organized a webinar on the topic 'Channelizing Youth Power to Build the Nation' as part of National Youth Day on 12<sup>th</sup> Jan 2021. The Resource Person was Mr. Anand Jagadeesh, Secretary, IEEE CS Bangalore Chapter, Software Engineer, DELL EMC 2016 REM Scholar. He discussed his life experience as a youth and also talked about the contributions that young people could make to build the nation.

#### TECHXIDO '20: VIRTUAL DESIGN PROJECT EXPO

Inauguration of ECHO (Electronics and Communication Heuristics Organization- the student organisation of ECE) activities and TECHXIDO '20 (the design project expo for students of the third year) was conducted on February 5<sup>th</sup>, 2021. Dr George Issac, Principal, FISAT, inaugurated the event and Dr Sunny Kuriakose, Dean, Academic and Administration offered felicitations. 25 design projects were exhibited. The judging panel consisted of two industry experts: Hrishikesh Dilip, Senior Embedded software engineer at VVDN Technologies, and Aravind K Jayan, Engineer at Digital Core Technologies. The best design project was won by Job Sajan John, Kiran Jayaram, Roshith Roy, and Sharath K of S5 ECE B for the project 'Contactless UI for lifts'. The award for the most popular project was based on the number of views received by the video of the project demonstration. This award was won by Ayana Sunny, Fameela V A, and Farhana Mohamed C of S5 ECE A for the project 'Human temperature detector at doorbell'. Design projects can be accessed from the link: <http://fisat.ac.in/pages/techxido-20>.

#### PHOTOTRONICS 2021

Phototronics 2021 is a photography competition conducted by the ECHO on the 11<sup>th</sup> of April, 2021 for the students of the ECE department. The theme for students of 1<sup>st</sup> and 2<sup>nd</sup> year was 'Food'. The Theme for 3<sup>rd</sup> and 4<sup>th</sup> year was 'Wisdom'. The events saw a good participation from the students. Certificates were awarded to the winners in the 2 categories.



## ECHO WEBINAR SERIES 2K20

Electronics and Communication Heuristic Organization (ECHO) along with the support from Department of Electronics And Communication Engineering, FISAT organized ECHO webinar series from 15<sup>th</sup> July to 8<sup>th</sup> August 2020. The sessions are targeted towards faculty members & students of ECE. Each webinar aimed to address the latest technologies used in industries. The ECHO webinar series was held in 8 sessions. Over seven hundred participants, including students and faculty members of FISAT and other leading engineering colleges of Kerala, participated in the webinar series. Dr. Anitha. P, Chairman, FISAT on July 15, 2020, virtually inaugurated the ECHO webinar series as the Chief Guest. The Webinar series discussed the following topics:

SL. NO	NAME OF WEBINAR	DATE
1	Artificial Intelligence by Mr. B Krishnakumar, CEO, Lurre.ai	15 <sup>th</sup> July 2020
2	Webinar on Introduction to HDL and Programmable Logic by Aravind K Jayan, Engineer (LW), DCT-Kochi	18 <sup>th</sup> July 2020
3	Digital web marketing Mr. Sabarish Chokkalingom, Digital Marketing Solution Architect, Accenture, Melbourne, Australia	22 <sup>nd</sup> July 2020
4	Scope of VLSI and Timing Analysis by Ms. Anna Pavianose, FPGA Engineer, VVDN Technologies, Kochi	25 <sup>th</sup> July 2020
5	Basics of Analog Layout Design by Mr. Cecil M Xavier, Design Engineer, CADENCE Design Systems, Bangalore	28 <sup>th</sup> July 2020
6	Embedded System Design Hardware Perspective by Mr. Christino Jacob, Sr. Engineer (HW), VVDN Technologies, Kochi.	30 <sup>th</sup> July 2020
7	Introduction to Embedded Software and Boot Up Procedure in an Embedded System by Mr. Albin Robin, Design Engineer (SW) DCT, Kochi.	30 <sup>th</sup> July 2020
8	5G NR: The Next Generation Wireless Access Technology" by Dr. Sreejith T V, Assistant Professor, Dept of Electrical Engineering and Computer Science, IIT Bhilai.	8 <sup>th</sup> July 2020

### APPRECIATION LETTER TO FISAT BY ASAP

Appreciation letter was handed over to FISAT by ASAP (Additional Skill Acquisition Programme), Higher Education Department, Govt. of Kerala, for designing and developing an online portal for ASAP placement drive ASPIRE. IEEE FISAT SB student developed a dynamic automated software to coordinate the placement activities for all graduates, postgraduates and diploma engineering students. The program named 'Aspire' is an initiative of ASAP and Higher Education Department, Kerala Govt., to provide quality placement and internships. FISAT got an opportunity to associate with this project.



Mr. Bejoy Varghese, Asst. Prof, ECE receiving appreciation letter

### WEBINAR ON 'OPPORTUNITIES FOR HIGHER STUDIES AFTER B.TECH'

A Webinar on the topic 'Opportunities for higher studies after B.Tech' was organised jointly by ECHO (Association of ECE) and IDEA (Association of EIE) on 18<sup>th</sup> May, 2021. Various opportunities after the B.Tech course such as 'Job & Internship Opportunities', 'Exam pattern of Central & State Govt jobs', 'Scope of GATE', 'Higher studies options in India' etc were discussed. The resource person was Mr. AswinChandran, Founder Director of 'Edzumo Pvt. Ltd' and Director of 'CGP career avenues'. The event had a participation of around 70 students.

### CONFERENCE PUBLICATIONS

Pearlsy, P. V., Asst. Prof, ECE published a conference paper titled "A Novel Simplified Approach for Text Line Extraction of Handwritten Malayalam Document." in the '2020 Advanced Computing and Communication Technologies for High-Performance Applications (ACCTHPA)', IEEE, 2020.

Mr. Basil K Jeemon, Asst. Prof, ECE published a conference paper titled "Design and Analysis of a Novel Space-Time-Frequency Block Coded Vector OFDM Scheme Robust to Rayleigh Fading" in the '2020 IEEE 17th India Council International Conference (INDICON)', 2020, pp. 1-5, doi: 10.1109/INDICON49873.2020.9342086.



## CONGRATULATIONS! UNIVERSITY RANK HOLDERS

ECE department secured 2 ranks in the university for the 2016-20 batch. Ms. Athira S (FIT16EC046) secured 1<sup>st</sup> rank and Ms. Lakshmi Vijayan N (FIT16EC081) secured 8<sup>th</sup> rank in B.Tech ECE of the APJ Abdul Kalam Technological University. This achievement added more feathers to the cap of the department. Previously, Ms. Minnu Simon of 2015-19 batch ECE had secured 2<sup>nd</sup> rank in the university. The ECE department has an outstanding track record in academics since its inception. The department stands tall with over 13 university ranks under affiliations of M G University and KTU. Apart from that, the students of the department also receive accolades for co-curricular and extra-curricular activities.



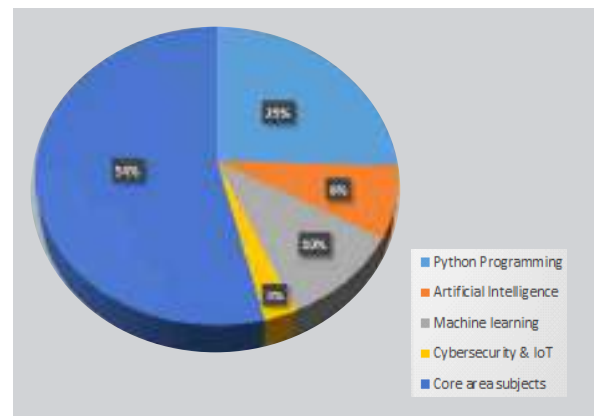
**Athira S**



**Lakshmi Vijayan N**

## ONLINE COURSES ATTENDED BY ECE STUDENTS

Students of ECE got certified in around 648 online courses during the last academic year. These are the courses offered by leading universities in the world such as the University of Michigan, University of Georgia, University of Colorado, Stanford University, University of California, University of Colorado-Boulder, IITs, University of London, IBM, Google analytics academy, University of Buffalo, University of Washington, Johns Hopkins University, University of Toronto etc. Such courses were offered through online educational platforms such as Coursera, Udemy, Google analytics academy, NPTEL, Hortari Technologies etc to name a few. The most popular courses among students and the percentage based on the number of students who attended those courses are illustrated below.



## RPA COURSES IN ECE DEPARTMENT



Mr. Anoop E G, Asst. Prof, ECE completed RPA developer certification programme conducted by ASAP. It included a 1-week online workshop and 13 online Robotic process courses and an online assessment. As he has become a certified RPA professional, the ECE department can run the RPA courses for students.



**Best Outgoing student of  
2016-20 batch of ECE**

**Ms. Unnimaya K S**

## MEMBER OF KTU BOARD OF STUDIES



Dr Mini P R, Professor & HoD, ECE got selected as a member of KTU Board of studies. Dr. Mini P R obtained Ph.D from CUSAT in the year 2018.



**Ms. Nanda K R**  
(2017 admission)













**Ms. Santhwana T**  
(2018 admission)

**Recipients of  
'Hima Memorial Endowment award 2020'  
are Ms. Nanda K R and Ms. Santhwana T**



## HIGHER STUDIES FOR THE ACADEMIC YEAR 2020-21

It's true that the pandemic has slowed down the whole world, but not the quest of our students to study more. Congratulations and best wishes for our students who were selected for higher studies during the academic year 2020-21

1	<b>Merlin Joy</b> (2016-20 batch)		M.Sc Data Science, University of Salford, UK
2	<b>Sarath A</b> (2016-20 batch)		M.Sc Data Science, University of Surrey, UK
3	<b>Veena Menon P</b> (2016-20 batch)		Wireless Networking, Lambton College under Queens University, Mississauga, Ontario, Canada.
4	<b>Amna Nizar</b> (2016-20 batch)		M.Tech Software Engineering, BITS Pilani
5	<b>Afzal N</b> (2016-20 batch)		Masters in engineering management with industry, University of Leicester, UK
6	<b>Haseeb P</b> (2016-20 batch)		M Tech Wireless Technology, Cochin University of Science and Technology (CUSAT)
7	<b>Anand Paul</b>		Master of Engineering in Electrical and Computer Engineering, University of Windsor, Ontario, Canada
8	<b>Christino Jacob</b>		
9	<b>Albin Robin</b>		
10	<b>Fareedah Mohammed Ismail</b>		MBA at FISAT Business School (FBS), KTU

## IEEE KERALA SECTION OUTSTANDING STUDENT

**WIE (Women in Engineering) volunteer award.**

**Ms. Devika S**  
final year (2017 admission)



- ◆ MsSaiba Hameed P A of 2016-20 batch, ECE became gold honour winner in the 'International astronomy and astrophysics competition 2020' conducted by IAAC, Germany.
- ◆ Nivedhitha M of 2020 admission secured third prize in power-play quiz and first prize in Mocolet, competitions organized by IEEE, FISAT.

## ACHIEVEMENTS OF MAIN PROJECT (2017 ADMISSION)

- ◆ 11 project batches from the ECE department shortlisted to the final round of Innovation grant conducted by the Kerala startup mission.
- ◆ 21 project batches shortlisted to the IDEA FEST 2021 organized by Kerala Startup mission.
- ◆ One project batch shortlisted to the YOUNG INNOVATORS PROGRAM (YIP) organized by Kerala Development and Strategic Council (K-DISC).
- ◆ One project team short listed the KTU CERD fund.

## VAIGA AGRI HACK 2021

Abhay Raj (S6 ECE A), Jose Ben (S4 ECE B), Aswin Sreeraj (S4 ECE A), Basil Leju (S6 CSA) selected for the final round of VAIGAAgri Hack 2021, Kerala's largest agricultural hackathon conducted by the Government of Kerala Agricultural department.





## VALUE-ADDED COURSES

ECE department offers value-added courses with the objective to make the students industry-ready. The syllabus is designed in such a way to attain the objective in an effective manner. The course content consists of theoretical and skill developmental aspects to enrich the students' knowledge. The various industry-oriented value-added courses offered by the department of ECE to students are:

Students with the year of admission	Course offered
First year (2020 admission)	Introduction to programming in python
Second year (2019 admission)	Python for Scientific Computing and data visualization
Third year (2018 admission)	Computer Vision and AI
Final year (2017 admission)	Industrial oriented Semi-custom layout design using Cadence and Microwind tool

## ALUMNI SPEAKS

Testimonies by several of ECE inspiring alumni who have gone to find great success in their careers



### Abhiram D

Sr. Embedded software engineer,  
 VVDN Technologies, 2013-2017 batch

“The ECE department offered a solid theoretical base in engineering and hosted many Embedded Systems workshops. FISAT has been like a family to me, and I'll always remember and treasure the time I spent here.”



### Jilu John

Hardware Engineer, Qualcomm, Hyderabad  
 2013-2017 Batch

“The four years of B.tech was such a great experience that raised me as a Hardware Engineer in one of the leading multinational company,

Qualcomm. I am delighted to remember this wonderful campus and my favourite teachers in all of my achievements. Yes, I am proud to be a FISATian.”



### Durga N Pai

Finance Intern TIER Mobility GmbH,  
 Berlin, Germany, 2013-17 Batch

“FISAT not only focuses on academics but also on extracurricular activities which help to bring out the hidden skills in you. The faculties are helpful and supportive throughout the course and even after.”



### Lakshmi Vijayan

8th rank in University for B.Tech ECE,  
 TCS Digital, 2016-20 batch

“The placement department has made great efforts to ensure that the maximum number of students are placed in premium companies. In a nutshell, these 4 years were a perfect concoction of knowledge, growth, humour and emotional intelligence.”



### Eldhose Peter

Senior Machine Learning Engineer  
 RPA LABS, USA, 2013-17 Batch

“FISAT -A bundle of joy and memories to cherish for a lifetime. I will always be thankful to FISAT and would ever remain a pivotal milestone in my life.”



### Minnu Simon

2nd rank in University for B.Tech ECE,  
 Assistant Systems Engineer, TCS, 2015-19 batch

“The library is well equipped with a very wide collection of books. The college always provided opportunities to indulge in various activities like arts fests, club activities and many more. Placement Cell and placement training of our college are highly outstanding.”



### Jayadev Nair

Quality Engineer - Signal Processing & Communications,  
 MathWorks, Boston, USA, 2010-2014 Batch

“The ECE Department, without a doubt, created the grounds for the success of my career so far. I'm beyond grateful for all of the help that the faculty have provided in those 4 years and after, and I can say for certain that it kickstarted my interests and helped mould my career into what it is today.”



### Vivek Kanissery

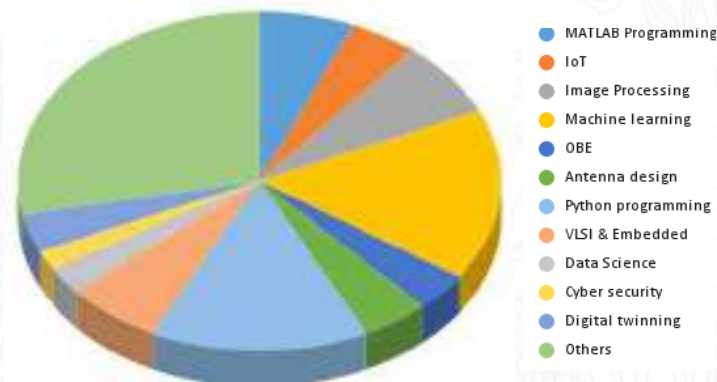
Beacon Platform Inc., Senior Platform Engineer, New York, USA, MS in Electrical and Computer Engineering, Carnegie Mellon University, 2010-2014 batch

“Alongside the regular coursework, I was part of a research team that helped me explore other disciplines of Engineering while working on fun and complex projects. This exposure cultivated confidence in my technical problem-solving ability that has proven to be vital in subsequent stages of my career.”



## FDPS AND WORKSHOPS ATTENDED BY FACULTY FROM JULY 2020-JUNE 2021

The faculty of ECE has attended around 120 FDPs and workshops during the academic year 2020-21. This, in turn, helps teachers guide students in areas where they have developed expertise. The chart shown below illustrates the trending topics and the percentage share of faculty attended.



## ONLINE COURSES ATTENDED AND QUALIFIED BY FACULTY

SI No	Name of faculty	Name of course	University
1	Jilu George	Introduction to Professional Scientific Communication	NPTEL-IIT Kanpur
		Programming for everybody -Getting Started with Python	University of Michigan, Coursera
2	Benoy Abraham	Introduction to virtual reality	University of London and Goldsmiths
		Introduction to Augmented reality and ARCore	Google AR & VR
		Introduction to Big Data	University of California, San Diego
3	Subha Thomas	Programming for everybody -Getting Started with Python	University of Michigan, Coursera
4	Christy Jose	Python Data Structures	University of Michigan, Coursera
		Programming for everybody -Getting Started with Python	University of Michigan, Coursera
		Everyday Parenting: The A B Cs of Child Rearing	Yale University, Coursera
5	Jeslin P Jo	Neural Networks and Deep Learning	Stanford University, Coursera
		Python Data Structures	University of Michigan, Coursera
		Programming for everybody -Getting Started with Python	University of Michigan, Coursera
6	Manju C P	Python Data Structures	University of Michigan, Coursera
7	Sreelakshmi S	Programming for everybody -Getting Started with Python	University of Michigan, Coursera
		Python Data Structures	University of Michigan, Coursera
8	Bini V K	Programming for everybody -Getting Started with Python	University of Michigan, Coursera
		Python Data Structures	University of Michigan, Coursera

### UnRavel

The Mysterified Brainstormera technical quiz competition was conducted on May 20<sup>th</sup> 2021 by ACM Student Chapter. The competition consisted of 3 rounds in which 50 students participated. Each participant was asked to answer 15 questions based on the picture clues given. Haniya Rehman (S2 CSEA), Ashwin M.S (S4 CSEA), Aiswarya Madhu (S2 CSEA), Ashal Niju (S2 CSEA) were the top-drawers of the event.

### The Tambola Housie

A fun game was conducted on May 21st 2021 by Students Chapter of ACM. The game had a total of 49 participants. In which the full house was claimed by AnupamaVidyasagar (S2 CSEA), Aman K Shihab (S4 CSEA), Jiss Jose (S4 CSEA) and Archana K (S2 CSEA) claimed Top line, Middle Line and Bottom Line respectively. The event was made even more fun and interesting with ACM Rejuvin 2021 on May 21st 2021 where all the ACM FISAT members and alumnis came together to share their memories and interact with other adherents of ACM FISAT. It was a fun filled session with games and a lot of fun. Haniya Rehman (S2 CSEA), Aishwarya Madhu (S2 CSEA), Ashwin M.S (S4 CSEA) were selected as the top performers of the whole event. Winners were encouraged with exciting prizes. The participants were also given certificates as a token of encouragement.



## ACADEMIC TOPPERS ECE

S4 BATCH



**RAISHWARYA**  
CGPA: 9.71



**CHRISTY SEBI**  
CGPA: 9.58



**KARINA P JOSHI**  
CGPA: 9.58



**NIKHITHA JOHNSON**  
CGPA: 9.58



S6 BATCH



**FOUSIYA P MANAF**  
CGPA: 9.35



**SANTHWANA T**  
CGPA: 9.13



**UPANYA U PAI**  
CGPA: 9.37



**MEERA R**  
CGPA: 9.24

S8 BATCH

## ACADEMIC TOPPERS ME

2019 BATCH



**VARUN S (S4 ME B)**  
CGPA: 9.44



**ARJUN V DAS (S4 MEA)**  
CGPA: 9.29



**ANTONY FRANCIS (S6 ME A)**  
CGPA: 9.32



**JOHN GLEN M (S6 MEA)**  
CGPA: 9.12

2018 BATCH

2017 BATCH



**NAMITHA K (S8 ME B)**  
CGPA: 9.44



**SANDRIO JOSE (S8 ME B)**  
CGPA: 9.34



## ONLINE INTERNATIONAL FACULTY DEVELOPMENT PROGRAMME ON “RECENT TRENDS AND ADVANCEMENTS IN INFORMATION TECHNOLOGY”

The Department of Computer Applications organized a One week online International Faculty Development Programme on "Recent Trends and Advancements in Information Technology" from 27<sup>th</sup> July 2020 to 1<sup>st</sup> August 2020. The main motive of the FDP was to create an insight into the recent technologies to the faculties and researchers. The relevant topics like Blockchain, Cybersecurity, Deep Learning models, Web Scrapers, 6G etc. were the main areas discussed by the resource persons. To bridge the gap between academics and industry, resource persons were selected from both the academic and industrial sector.

Considering the situation of covid pandemic, the whole FDP was held through an online platform. There were around hundred participants with keen interest in the programme. Ms. Rose Mary Mathew and Dr. Rakhi Venugopal were the coordinators for the programme.

27 <sup>th</sup> July 2020	 <b>Dr. Anoop V.S.</b> Senior Scientist and Head of the Training Division, Blockchain Academy, Kerala Blockchain: A Hope Or Reality? A Sneak Peek	 <b>Mr. Thomas Sebastian</b> Solution Architect, TCS, Kochi Key Trends in Bigdata, Cloud and Data Analytics
28 <sup>th</sup> July 2020	 <b>Dr. Sabu M.K.</b> Associate Professor & HOD, Dept. of Computer Applications, CUSAT. Sequential Data Processing Using LSTM	 <b>Mr. Mohesh Mohan</b> Senior Security Specialist, Smart Dubai, Dubai. Cybersecurity Before and After 2020 Trends and Challenges
29 <sup>th</sup> July 2020	 <b>Mr. John Joseph</b> Project Manager, Fligent Global Solutions, Kochi. DevOps - The Agile Enabler	 <b>Dr. Sreeraj M</b> Asst. Professor, Dept. of Computer Science, Vee Arappu College, Chengannur. Convolutional Neural Networks
30 <sup>th</sup> July 2020	 <b>Mr. John Umman</b> Security Analyst, Ernst & Young, Kochi. Core Domains in Applications Security	 <b>Mr. Mahesh C</b> Asst. Professor, Dept. of CSE, FIEST. Web Scraping
01 <sup>st</sup> August 2020	 <b>Dr. Bindiya M Varghese</b> Dean, Computer Science, Rajagiri College of Social Science, Kalamassery. Empowering the academics in the wake of e-learning	 <b>Dr. Jobin Varghese</b> Scientist, Fraunhofer Institute for Ceramic Technologies and Systems (ICT), Germany. 5G to 6G Wireless to 6G AI Technology

### VIRTUONAM 2K20 - ONLINE ONAM CELEBRATION

Onam 2020 celebration was different due to the pandemic spread of COVID-19. It was an initiative of the association FIESTA of the Dept. of Computer Applications. VirtuOnam was the first experience of a celebration through an online platform for the students and faculty. The programme was on 27.08.2020 at 10 AM. Mr. Nikhil Kaimal (Student Secretary, FIESTA) welcomed all participants and the inauguration was done by HoD of Computer Applications, Mr. Santhosh Kottam. There are three events included in the schedule- Malayali Maran/Manka competition, Onappattu and Selfie with Pookkalam. All students and faculty members actively participated in the programme. The winners of the competitions were appreciated by giving cash prizes.

Malayali Maran was Mr. Deepak Kurien of S5 MCA 2018 Regular and Malayali Manka Ms. Kavya G of S5 MCA 2018 Regular. First Prize for Onappattu was won by Ms. Yamini K of S5 MCA 2018 Regular and Second Prize was won by Mr. Amal Devassia, S3 MCA 2019(B) Regular batch. First Prize for Selfie with Pookkalam was won by Ms. Bhagya Madhu of S3 MCA 2019(A) Regular batch and Second Prize was won by Ms. Amritha B Nair of S5 MCA 2018 Regular batch.

Every faculty member recollected their onam memories and their onam wishes in between the events. The celebration ended at 1.30 PM with a vote of thanks delivered by Ms. Anita Prince (Student Representative- S5 2018 batch MCA, FIESTA).

### VIRTUAL PROJECT EXPO 2020

Department of Computer Applications in association with FIESTA has conducted a Virtual Project Expo on 14/8/2020 from 10 AM to 1 PM in which total of ten selected projects- 5 from each S6 MCA Regular and S4 MCA SD students were exhibited.

Each student has made a 20 Minutes presentation and answered all queries from the judges and participants. Students of S2 MCA 2019 batch and S4 MCA 2018 batch attended the online project exhibition conducted through Google Meet Platform. It was very useful for the Junior students to clear their project related queries and get an idea about the latest technologies.

Mr. Sanjo George of S6 MCA Regular won the first prize for the project titled “Violence detection in surveillance videos” and Mr. Amal Babu of S4 MCA second Year Direct won the Second prize for the project titled “Image processing and artificial neural network for people counting using Jetson Nano”



## HEALTHY PRACTICES

### APTITUDE PRACTICING SESSION (POCKETAPTITUDE)

To make the students more fit to the upcoming placement drives, an aptitude practicing session is initiated for the S2 MCA 2020 A and B batch students from 3<sup>rd</sup> May 2021 onwards. Students are preparing questions based on Quantitative ability, Logical ability, Verbal reasoning etc. Tricks and tips to solve these questions and answers are also shared.

Staff Coordinators :

Ms. Manju Joy and Ms. Joice T (A Batch)

Ms. Deepa Mary Mathews and Dr. Rakhi Venugopal (B Batch)

Student Coordinators :

Mr. Ebin Kuriakose (A Batch)

Ms. Madonna Thomas and Mr. Kiran Karthikeyan (B Batch)

### TECHNOLOGY AWARENESS PROGRAMME & COMPUTER LANGUAGE AWARENESS PROGRAMME (TAP & CLAP)

To enrich and update with the recent happenings in the world of technology, a short video about the latest technology or a document about any computer language is shared through the online communication platform on every Monday. MCQs regarding the topic will be shared towards the end of the session. The programme is initiated for the S2 MCA 2020 B batch students from 3<sup>rd</sup> May 2021 onwards.

Staff Coordinators

Ms. Deepa Mary Mathews and Dr. Rakhi Venugopal.

Student Coordinators

Ms. Rose Mary Cleebert and Ms. Sruthi E.

### WEBINAR ON MACHINE LEARNING

FIESTA organized a webinar on machine Learning on 19.08.2020, Wednesday. The resource person was Dr. Sreeraj M, Asst. Professor, Sree Ayyappa College, Chengannur. The objective of the seminar was to give an insight about the scope and recent research trends in Machine Learning. Dr. Sreeraj also gave the guidelines to do projects in different domains of machine learning. The webinar was much helpful in understanding the different phases of machine learning project development. It was very effective and fruitful to the final year students..

### ORIENTATION PROGRAMME

The orientation programme for MCA 2020 batches was conducted on 17<sup>th</sup>- 20<sup>th</sup> November 2020. Resource persons were from a leading training institute Pragmatix. Different topics like

How to start a professional course, Importance of communications in Software Industry, placements and Interviews are discussed by the trainers. Also provided an Ice breaking session to first year students to become familiar with batch mates.

### THOUGHT FOR THE DAY

In order to create optimism and hope, S2 MCA A batch students are advised to share some motivational quotes with their classmates and teachers through the online platform. Every morning, this activity named 'Thought for the Day' is done by the students on roll number basis, with lots of enthusiasm. It is helping them to remain positive and energetic in these days of pandemic. Group advisors are monitoring these activities

Staff Coordinators : Ms. Manju Joy and Ms. Joice T

Student Coordinator : Ms. Ann Sarah Babu

### KNOW AN APP (KAPP)

Many of the recent apps have changed the way one connects with the world and meet people's various needs in a fast-paced society. To update with various recent apps, a programme is organized for the S2 MCA 2020 B batch students from 9<sup>th</sup> May 2021 onwards. On every Sunday, a short presentation explaining various applications will be shared.

Staff Coordinator : Ms. Deepa Mary Mathews

Student Coordinator : Mr. Midhun Madhav P S

### NPTEL

Ms. Rose Mary Mathew has secured Elite+Silver medal grade for NPTEL course on "Python for Data Science" conducted by IIT Madras during Jan-Feb 2021.



### BRIDGE PROGRAMME

The Department of Computer Applications offered three bridge courses to MCA 2020 Batch students. The revised MCA curriculum provides theoretical and practical approaches on industry oriented subjects. In order to put up with the new syllabus, the department offered the following courses.

- (1) Review of C Programming and Data structures
- (2) Review of Operating System
- (3) Review of Mathematics

Aforementioned subjects will help non-computer science students to start the MCA programme with a strong background. The topics were handled by the faculty from the Department of Computer Applications and Mr. Sumesh G, Department of Science and Humanities.



## FACULTY ACHIEVEMENTS

**Mr. Sujesh PLal had filed and issued 2 patents by Intellectual Property India (IPR).**

PORTABLE LOW COST SMART SPIROMETER USING EMBEDDED & IOT TECHNOLOGY

The Patent Office Journal No. 31/2020 Dated 31/07/2020

Page No. 28697

HOME ANALYSIS FETAL HEART RATE MONITORING AND KICKING MEASUREMENT USING EMBEDDED AND IOT TECHNOLOGY

The Patent Office Journal No. 31/2020 Dated 31/07/2020

Page No. 28730



### FELIZ NATAL 2020 - ONLINE X'MAS CELEBRATION

Department of Computer Applications in association with FIESTA conducted Virtual Christmas Celebration FELIZ NATAL 2020 on 18<sup>th</sup> December 2020 through Webex platform. The programme started at 10.00 a.m. with an invocation of silent prayer. Mr. Nikhil Kaimal, Student Secretary, FIESTA welcomed all of the faculty members and students to the event. Respected HoD Mr. Santhosh Kottam addressed the gathering. The event was a united effort of SIMCA 2020 A&B batches, S3 MCA 2019 A&B batches, and S5 MCA 2018 Regular batch. Carols, Cake Baking, Dance and Games were played through online platform. Every teacher expressed their X'mas wishes and New year greetings. The programme ended at 12.15 PM with a vote of thanks by Ms. Anita Prince, Student Representative, FIESTA.



### EXPERT TALK ON ENTREPRENEURSHIP AND INNOVATIONS IN TECHNOLOGY

The Department of Computer Applications has organized webinars on “Entrepreneurship and Innovations in Technology” based on the new syllabus of the MCA programme. Entrepreneurship and Innovations in Technology is a non-credit subject included in the MCA syllabus to discuss independent decision making, entrepreneurial thinking, working in teams, team leading and assumption of responsibilities in their role as organizers. S1 MCA 2020 Batch students and faculty from Department of Computer Applications attended the webinars.

#### Webinar-1 :

Webinar on “software Industry Career Streams” has conducted on 3<sup>rd</sup> March 2021 by Mr. John Joseph, Project Manager in Finjent Global Solution, Kochi.

#### Webinar-2 :

Webinar on “organisational structure, behavior and success key tips“ has conducted on 12<sup>th</sup> March 2021 by Mr. Sarath P Paracka, Process Delivery Subject Matter Expert , Zellis HR India Pvt. Ltd., Kochi.





## STUDENTS ACHIEVEMENTS

Mr. Sanjo George of MCA 2017 Regular batch won 9.12 CGPA and secured third position in MCA examinations conducted by APJ Abdul Kalam University, Kerala.

### THIRD RANK IN KTU



### VISHNU VENUMOHAN MEMORIAL ENDOWMENT AWARD

Vishnu Venumohan Memorial Endowment Award for the Best Outgoing Student from the Department of Computer Applications for the academic year 2019-2020 was awarded to Mr. Sanjo George, S6 MCA 2017 Regular Batch.

## INVITED TALKS

- ◆ Expert talk on “HDL Implementation of Combinational and Sequential Circuits” was conducted for the S1 MCA 2020 Regular A and B batches by Ms. Sreelakshmi S (Asst. Professors, Dept. of ECE, FISAT) & Ms. Elza George ( Asst. Professor, Dept. of ECE, FISAT) on 18<sup>th</sup> March 2021.
- ◆ Expert talk on “Single Board Computers” was conducted for the S1 MCA 2020 Regular A and B batches by Mr. Pankaj Kumar G, Asst. Professor, Dept. of CSE, FISAT on 19<sup>th</sup> march 2021.
- ◆ Expert talk on “PHP Frameworks” was conducted for S3 MCA 2019 Regular A & B batches by Mr. Ajay Antony Joseph, Asst. Professor, Dept. of Computer Science, Yeldho Mar Baselious College on 24<sup>th</sup> march 2021



## ONLINE COURSES

Computer Applications students have attended various online courses offered by the well-known online educational consultant Coursera. More than 50 Students from S5 MCA Regular 2018 batch and S3 MCA Regular 2019 batch, participated in Coursera courses and bagged certificates with good scores.

## STARTUP

Mr. Dibin Jose, S5 MCA Regular 2018 Batch, in association with two MBA students from FISAT Business School has initiated a startup 'CONEX365' in April 2020, which provides an e-learning Platform and consultancy services in the education Sector. The main objective of the startup is to fill up the gap between industry and academia. Another mission of the startup is to equip aspirants from rural areas to attend job opportunities in a professional way.

## MCA INDUCTION MEET 2020

An Induction ceremony for the MCA Regular Programme conducted on 16<sup>th</sup> November 2020 through an online platform. Both parents and the students were invited to the function. All the dignitaries were welcomed by the principal Dr. George Issac. The Induction Ceremony was thereby inaugurated by Dr. Anitha P, Chairman FISAT. The gathering was felicitated by - Dr. C Sheela Vice Principal, FISAT, PTA President – Mr. Sunil A Menon, Dr Sunny Kuriakose, Dean Academic and Administration, and Dr. Unni Kartha, Professor and Placement Officer, FISAT. The distinguished dignitaries spoke about always being perpetually curious, spending quality time in fine tuning our skills and building a strong social and academic foundation thus carving out a successful future.

Mr. Santhosh Kottam, Head of the Department of Computer Applications, delivered a Vote of Thanks expressing his whole-hearted gratitude to all the dignitaries, students, teaching and the non-teaching staff. The afternoon session included a short seminar on the MCA Regular two year programme curriculum

## PLACEMENT AND TRAINING CELL

The Placement and Training Cell of the Department of Computer Applications is a team of vibrant student representatives and staff. Our Placement team is functioning in association with the Placement Cell of FISAT. During 2019-20 academic year, students of MCA Regular 2017 and MCA 2018 Second Year Direct batches achieved glorious placement records. More than 60 placement offers have been grabbed by our students. During 2020-21 academic year, students of MCA Regular 2018 batch achieved 20 offers and counting. The major recruiters are TCS, UST Global, 6D, CTS, Innovature Chegg and so on. We offered a two week intensive placement training program for final year students led by two major consultancies Mpower and Pragmatix for improving the personal and aptitude skills of the students. This training helped the students to prepare themselves for the placement. The placement activities of the department is coordinated by Mr. Jomon MC, Asst. professor





### COURSES ATTENDED BY FACULTIES

Name	Course attended	Course Conducted
Ms. Joice T	Python for Data Science	NPTEL, IIT Madras.
	Data Mining	NPTEL, IIT Madras.
Ms. Rose Mary Mathew	Introduction to the Internet of Things and Embedded Systems	Coursera, University of California, Irvine
	Process Mining : Data Science in Action	Coursera, Eindhoven University of Technology
Mr Sujesh P Lal	Introduction to Internet of Things and Embedded Systems	Coursera, University of California, Irvine
	Blockchain Basics	Coursera, State University of NewYork, Buffalo
Ms. Shidha M V	Introduction to Analytic thinking, Data Science and Data Mining	Coursera, University of California, Irvine
Dr. Rakhi Venugopal	Introduction to Analytic thinking, Data Science and Data Mining	Coursera, University of California, Irvine
Ms. Anju L	Introduction to Analytic thinking, Data Science and Data Mining	Coursera, University of California, Irvine
Mr. Santhosh Kottam	Programming for Everybody (Getting Started with Python)	Coursera, University of Michigan
Mr. Nithin Rajan	Introduction to Architecting Smart IoT Devices	Coursera, EIT Digital
Ms. Sona Mary Louis	Data Analysis in Python	REST Society for Research International (RSRI), Tamil Nadu
Ms. Deepa Mary Mathews	Applied Machine Learning	Coursera, University of Amit

### RESEARCH ARTICLES PUBLISHED

Sl.No.	Title	Journal/Conference	Month & Year
<b>SANTHOSH KOTTAM</b>			
1.	Soft Set Based Approach for Mining Frequent Item sets	International Journal on Technical and Physical Problems of Engineering (IJTPE), ISSN 2077-3528, SCOPUS INDEXED, Issue 45, Vol. 12, No. 4,PP. 50-56.	December 2020
2.	Soft Set Theory-A Novel Soft Computing Tool for Data Mining	International Journal of Applied Engineering Research (IJAER), ISSN 0973-4562, Vol. 15, Number 11, 2020, pp. 1052-1058.	November 2020
3.	Multi-Soft Set Based Approach for Rule based Classification Using Sequential Covering Algorithm	Advanced Computing and Communication Technologies for High Performance Applications (ACCTHPA), ISBN 978-1-7281-6453-3, SCOPUS INDEXED, IEEE, pp. 34-42	July 2020
<b>SHAHNA K U</b>			
1.	A novel image encryption scheme using both pixel level and bit level permutation with chaotic map.	Applied Soft Computing, Elsevier 90, 106162. SCIE/SCOPUSDOI: <a href="https://doi.org/10.1016/j.asoc.2020.106162">10.1016/j.asoc.2020.106162</a> (SCI Impact Factor: 5.472)	
2.	Novel Image Encryption Technique Using Multiple One Dimensional Chaotic Map	Advances in Intelligent Systems and Computing, vol 1383. Springer, Cham. SCOPUS/WoS DOI: 10.1007/978-3-030-73689-7_84	
<b>SUJESH P LAL</b>			
1.	A provenance based defensive technique to determine malevolent selective forwarding attacks in multi-hop wireless sensor networks	Journal of Ambient Intelligence and Humanized Computing (JAIHC), Springer. SCIE/SCOPUS DOI:10.1007/s12652-020-02079-8 (SCI Impact Factor: 4.594)	
2.	“An energy efficient lightweight security protocol for optimal resource provenance in wireless sensor networks”	Turkish Journal of Electrical Engineering & Computer Sciences (Open Access Free Journal) SCIE/SCOPUS DOI: 10.3906/elk-2003-6 (Web Of Science, SCI impact factor: 0.703)	
3.	A Trust Analysis Scheme for Vehicular Networks within IoT-oriented Green City	Journal of Environmental Technology & Innovation, Elsevier. SCIE/SCOPUS (Impact Factor: 3.356).	
4.	Cryptographic Provenance Data Protection in IoT and Multi-hop Wireless Sensor Networks	The International Conference on Intellectual Research in Engineering, Science and Management (ICIRESM – 2020). Pg. 43-46	



## MCA FACULTY AS RESOURCE PERSON

**Ms. Deepa Mary Mathews**, Asst. Professor, Department of Computer Applications, FISAT, handled classes as a visiting faculty of the programme PG Diploma in Data & Business Analytics in the Mahatma Gandhi University, Kottayam. She handled the topic Data Mining for the students of 2021 batch from 29<sup>th</sup> January 2021 to 19<sup>th</sup> February 2021. The classes gave the students a deep understanding of the current business analytics.

**Ms. Joice T**, Asst. Professor, Dept. of Computer Applications was the resource person for the webinar on “Python for Data Science” on 4<sup>th</sup> May 2021 conducted at Govt. Polytechnic College, Kunnankulam. The webinar was informative and gave an idea about- How to use python programming language in Data Science.

## MAGAZINE TECHTRIP 2021

First year MCA 2020 A batch students released a magazine TechTrip 2021 during the first week of June 2021. The students of MCA 2020 A batch's aim behind this technical magazine was to enlighten themselves during the lockdown period due to the prevailing covid 19. Motivation and Mentorship are the creator of their destiny and they themselves are the master of their thoughts. The articles in the magazine TechTrip 2021 are the result of the dedication and commitment they have shown to the department and our college, FISAT

Staff Coordinators : Ms. Senu Abi, Mr. Sujesh P Lal

Student Coordinator : Abel Tomy, Aisha Farheen Rasheed

## ALUMNI WEBINAR SERIES

Department of Computer Applications has conducted a webinar series on “Recent Developments in Software Industry” in association with MCA Alumni Association (Rewind) during the period of 09/07/2020 to 21/08/2020. The topics selected for the webinar series were intellectual and informative for the participants, both students and faculty. The entire programme was coordinated by the faculty member Mr. Sujesh P Lal.

**Webinar-1:** Workshop on “**Programming with Python**”, by Ms Candy Mary (2016-2019 batch), Assistant Professor, Yeldo Mar Baselios College, Kothamangalam on 09/07/2020 to 10/07/2020.

**Webinar-2:** Webinar on “**practical sessions on meditation and relaxation techniques**” by Mr Sharan K S (2012-2015 batch), Subject Matter Expert, EY Kochi, on 15/07/2020.

**Webinar-3:** Workshop on “**django- A practical approach**”, by Mr. Ajai Antony Joseph (2016-2019 batch), Assistant Professor, Yeldo Mar Baselios College, Kothamangalam on 21/07/2020 to 22/07/2020.

**Webinar-4:** Webinar on “**Project Yourself for a Job in 2020**”, by Mr Deepak C Sebastian (2012-2015 batch), Head of Cloud Operations, SAP Labs Bangalore on 29/07/2020.

**Webinar-5:** Webinar on “**Introduction to Amazon Web Services**”, by Mr Dhanesh K U (2011-2014 batch), Associate, CTS Kochi on 07/08/2020.

**Webinar-6:** Webinar on “**Machine Learning Implementation Using Python**” by Mr Amal N R (2016-2019 batch), Associate System Engineer, TCS Kochi on 13/08/2020.

**Webinar-7:** Webinar on “**SAP Overview for Beginners**” by Mr Midhun (2011-2014 batch), Senior Software Engineer, WIPRO Bangalore, on 21/08/2020.

## STUDENTS PAPERS PUBLISHED

Sreeraj M, Joy J, Kuriakose A, Sujith M R, Vishnu P K & Haritha Unni. “CLadron\*: AI assisted device for identifying artificially ripened climacteric fruits”. Procedia Computer Science. 2020 Jan 1;171:635-43.

Sreeraj M, Joy J, Kuriakose A, Bhameesh MB, Babu AK, and Kunjumon M. “VIZIYON: Assistive handheld device for visually challenged”. Procedia Computer Science. 2020 Jan 1;171:2486-92.

Sreeraj M, Joy J, Jose M, Varghese M and Rejoice TJ. “Comparative analysis of Machine Learning approaches for early stage Cervical Spondylosis detection”. Journal of King Saud University-Computer and Information Sciences. 2020 Aug 29.



Ms. Candy Mary  
Asst. Professor  
Yeldo Mar Baselios College  
Kothamangalam



Mr. Sharan K S  
Subject Matter Expert @ Ey  
Heartfulness Practitioner And  
Trainer@ Heartfulness Institute



Mr. Ajay Antony Joseph  
Asst. Professor  
Yeldo Mar Baselios College  
Kothamangalam



Mr. Deepak C. Sebastian  
Head of Cloud Operations  
Sap Labs Bangalore



Mr. Dhanesh K U Associate  
Cognizant Technology  
Solutions, Kochi



Mr. Amal N R  
Associate System Engineer  
Tata Consultancy Services  
Kochi



Mr. Midhun M  
Senior Software Engineer  
Wipro- Bangalore



## ACADEMIC TOPPERS

S6 MCA 2017  
REGULAR BATCH



**SANJO GEORGE**  
CGPA: 9.12



**ANN MARIYA DAVIS**  
CGPA: 8.89



**ATHULYA GIREESAN**  
CGPA: 8.85

S2 MCA 2019 A  
REGULAR BATCH



**ANITTA ELDHOSE**  
CGPA: 9.82

S2 MCA 2019 B  
REGULAR BATCH



**MERIN DAVIS**  
CGPA: 9.45

S4 MCA 2018  
REGULAR BATCH



**ANJALY MADHU**  
CGPA: 9.11



**REENA MOL**  
CGPA: 9.14



**NEETHUMOL SANI**  
CGPA: 8.98



**SANDRA SANTOSH**  
CGPA: 9.23



**CHANJAL ANTONY**  
CGPA: 8.85

S7 MCASD 2018  
BATCH



**ROOPA JOLLY**  
CGPA: 8.89



**REHANA MOHANAN**  
CGPA: 8.72



**AMRITHA SUBRAMANIAN**  
CGPA: 8.67



**ATHULYA V NAIR**  
CGPA: 9.14



**JAINA JOY**  
CGPA: 8.68

### CAREER GUIDANCE SESSION

ACM Student Chapter FISAT had organized a webinar on “What After BTech?” on the 17<sup>th</sup> of May, 2021 from 15:00 to 16:00(IST). The session was handled by Mr. Ashwin P Chandran (Founder Director of EdzumoPvt Ltd, Director of CGP CAREER AVENUES).

This session aimed to discuss various Career opportunity that is available currently. The session began with an introductory speech by our ACM Member Miss Rose Stombel. A total of 45 students participated in the event which included both the ACM and Non-ACM members of the Computer science and engineering department of FISAT. The session concentrated on various Job and Internship Opportunities, exam patterns of Central & State Govt Jobs, the scope of GATE, Higher studies options in India, how to choose between M.Tech and MBA, and How to crack core private companies and product-based companies.

### -"Edge+"

The Intra College level technical event "Edge+" organised by ACM Student Chapter FISAT took place on 18<sup>th</sup> -21<sup>st</sup> May 2021. The event was led and executed successfully under the guidance of ACM FISAT Staff coordinator Sruthy Suresh, Asst Professor, CSE.

The event comprised of various technical and social events organised under ACM. These events are organised with the objective to provide a platform for the students to showcase their talent with a competitive spirit.

The event was successful enough to attract as many as students making it an event attended by more than 60 students for each event.

Edge+ consisted of 3 sub events viz. –

- ◆ IoTech – Workshop and Hands-on Competition
- ◆ UnRavel – The Mysterified Brainstormer
- ◆ The Tambola Housie
- ◆ ACM Rejuvin 2021



## NATIONAL SCIENCE DAY CELEBRATIONS 2021

The Department of Mechanical Engineering, Federal Institute of Science and Technology (FISAT), organized an invited lecture in connection with National Science Day, celebrations on 5<sup>th</sup> March 2021. Dr. Tessy Thomas, Director General (Aero), DRDO was the resource person. This was the 6<sup>th</sup> lecture in the Erudite Lecture Series being organized every year.

National Science day is celebrated all across India with great enthusiasm on 28<sup>th</sup> of February every year to commemorate the discovery of 'Raman effect' by the Indian physicist, Sir Chandrasekhara Venkata Raman, popularly known as CV Raman.

Dr. Tessy Thomas, delivered the key note lecture based on the theme **“Advances in Aerospace Engineering”**, her erudite speech, deep understanding about the subject, and research experience was a real motivation for the audience. It inspired the gathering and made them realize the importance of aerospace engineering in national security. The interactive session reiterated the importance and prospects of engineering studies.



## INTRODUCTION OF MODERNIZATION IN MOTOR VEHICLE DEPARTMENT

Department of Mechanical Engineering FISAT conducted a webinar on the topic **“Introduction of modernization in motor vehicle department”** on 07/11/2020 from 7:00 PM to 8:00 PM. The main objective of the webinar was to create awareness among the students about the motor vehicle rules and modernization of Kerala motor vehicle department (MVD).

Mr. Vinod Kumar N, Motor Vehicle Inspector of MVD Thrissur division was the chief guest for the webinar. Mr. Vinod Kumar has years of experience in MVD and is famous for his

lawful acts. Mr. Vinod Kumar N introduced forthcoming modernization in the motor vehicle department. He explained about HSRP (High-Security Registration Plate) which is very useful for preventing forgery and other unlawful acts, introduced IDTR (Institute of Driver Training & Research), explained various reasons for road accidents which include over speeding, rash driving, drunk and drive etc., types of number plates and their colour coding, about the smart card for DL&RC, RFID for all vehicles, paper-free office concept, SMS and Email alerts for all applicants/offenders, mobile app “tatwamasi” and “Sabarimala safe zone project”, “EPOS” machine. After the session by Mr. Vinod Kumar, there was a Q&A session which helped to clarify many concerns of students regarding new rules etc.



## OPPORTUNITIES TO STUDY ABROAD

Department of Mechanical Engineering FISAT conducted a webinar on the topic **“Opportunities to study abroad”** on 17/12/2020 from 3:00 PM to 4:00 PM. The main objective of the webinar was to provide information to students regarding various opportunities abroad for doing masters.

Mr. Nishaf Hassan - Head of operations, Edroots international cochin was the chief guest for the webinar. He introduced various

specializations and various universities abroad for mechanical engineering student. He explained how the world looks in the next five years which include advancement in robotics technology, IoT and clean energy. Robotics technology will be having a greater impact in India. Conglomerates like GE, SIEMENS, HTC, TOSHIBA, BOEING are setting facilities in India. The University of Newcastle in Australia is the best for doing masters in robotics. The robotics sector has the potential to reach dollar 1 trillion by 2025 in India. Renewable engineering has the potential to reach 225GW by 2022, 500GW by 2030, 80-billion-dollar investment is going to happen in this field in the next 4 years. India ranked 4<sup>th</sup> in wind power, 5<sup>th</sup> in solar power, 5<sup>th</sup> in renewable energy. The University of Exeter in England is the best for doing masters in this field. IT industry is booming in India, it will be a 350-billion-dollar industry by 2025. There is a shortage of data engineers worldwide. The University of Hertfordshire in England is the best for doing masters in this field.

He introduced top German universities which include RWTH Aachen, TU Munich, TU Braunschweig, University of Stuttgart, Karlsruhe Institute of Technology etc. also top UK universities like the University of Edinburgh, University of Manchester, University of Bristol, University of Glasgow, University of Birmingham.

There was a Q&A session that helped to clarify many concerns of students regarding pursuing masters and choosing the best university.





## ONE WEEK ONLINE FACULTY DEVELOPMENT PROGRAMME ON ADVANCES IN MATERIALS ENGINEERING AND SUSTAINABLE MANUFACTURING

The Mechanical Engineering department has organized a One Week Online Faculty Development Programme from 10<sup>th</sup> August 2020 to 14<sup>th</sup> August 2020 addressing the broad area of Material science, Smart Manufacturing, Sustainable materials and Sustainable manufacturing.

The FDP received international attention and had Resource persons from the USA and Malaysia. There were registered participants from the USA, Malaysia, Oman and Ethiopia apart from various states in India. Research scholars from various IITs/NITs attended the programme. The FDP had more than 350 registered participants who were active during the sessions and made the event fruitful.

FDP has focused on the commitment to build dynamic materials seamlessly and turn their discovery, development and application into an accelerated process. The event is inspired by India's mission to be self-reliant, or as we popularly call it 'Becoming Aatmanirbhar'.

The objective is to share expertise and diverse perspectives as we bring India's academia, industry and research professionals on a single platform. This is a learning experience for faculty and students alike and a great chance to learn about the use of advanced infrastructure and technical capabilities of premier institutions.

The Faculty Development Programme has been carefully put together to educate the community about the innovative processing methods that can help us build advanced materials all by ourselves. The FDP has emphasized the fundamentals of advanced manufacturing methods to transform raw materials into finished products.



Screenshot of the session by Dr. Babak Anasori, Assistant Professor, Purdue School of Engineering and Technology, Indianapolis, USA on "The family of 2D MXene materials"



### ALUMNI WEBINAR SERIES



**On 2<sup>nd</sup> July 2020** Mr. Sujith S (2010-2014 batch), Mechanical Engineer, Mechanical Components GE Power, Bangalore, delivered the topic **"Gas Power Technologies"**.



**On 10<sup>th</sup> July**, Mr. Alfred Johnson(2011-2015 batch), Procurement Officer, Al MAilem Group, Kuwait, Previously with MRF Tyres, Chennai, delivered the topic **"My journey to procurement officer"**.



**On 3<sup>rd</sup> July 2020**, Mr. T.M. Augustine (2009-2013 batch), Senior Engineer, AMT Automotive Transmissions, Mahindra And Mahindra Ltd., Mahindra Research Valley, Chennai, delivered the topic **"Realizing the leverage of your Academic Project"**.



On 28<sup>th</sup> July, Mr. Nikhil Mohanan (2011-2015 batch), PhD student at Ecole Poly technique de Paris, delivered the topic **"Way to research and opportunities in France"**.



**On 6<sup>th</sup> July 2020**, Bianca Kurian (2010-2014 batch), Senior Interaction Designer, Texas with Bell helicopters for HCL America Solutions, California, delivered the topic **"Acquainting with Engineering Career opportunities"**



**On 30<sup>th</sup> July**, Smobin Vincent (2011-2015 batch), PhD Researcher, Department of Energy Conservation and Storage, Technical University of Denmark (DTU), delivered the topic **"Way to research and opportunities in Germany"**.



## AICTE SPONSORED INTERNATIONAL CONFERENCE I-SMART 2021

*(Marching towards a sustainable future)*



The first International Conference on Sustainable Materials, Manufacturing and Renewable Technologies (i-SMaRT) was held from 22<sup>nd</sup> - 23<sup>rd</sup> April 2021, to promote sharing of new knowledge and exchange of the latest ideas in the field through deliberations in the conference.

The International Conference on Sustainable Materials, Manufacturing and Renewable Technologies (i-SMaRT) is conceived as a biennial academic conference and all the papers are peer-reviewed before acceptance. The first in the series, i-SMaRT 2021 is an ongoing attempt to provide a forum for high-quality academic papers and to promote rapid

communication and exchange between researchers, scientists, and engineers in the field of mechanical engineering. The conference also offers a good number of invited lectures from renowned speakers from different parts of the world and will facilitate opportunities to network, collaborate and exchange ideas with renowned scientists and researchers in the field.

The two-day conference covered the emerging areas of Material Science, Manufacturing Engineering and Renewable Energy. Novel and relevant technologies related to sustainability of materials, their manufacturing, the various principles for sustainable manufacturing and production, and the various technologies that support the use of renewable energy were a part of this two-day conference. In this respect, i-SMaRT 2021 conference helped us to exchange our ideas, knowledge, and potentials for the development of the subject and also to perform better research at the national and international levels. i-SMaRT 2021 can open up opportunities to create a new door for collaborative research activities even in the international arena.

The i-SMaRT 2021 has received around 180 full paper submissions. All the accepted papers will be published in proceedings (Abstract book) of i-SMaRT 2021 with an ISBN. In addition to this, authors were provided with options for publication in the Scopus indexed journal Materials Today: Proceedings (ISSN: 2214-7853) published by Elsevier and the articles will be made available through Science direct. The journal accepts novel and unpublished research in the field of materials science, technology and engineering.

Around 100 papers were selected for oral presentation at the conference and another 30+ papers were selected for poster presentations. Delegates from eight foreign countries and Indian researchers from premium institutions and institutes of national importance were part of this conference. Delegates from the USA, UK, Russia, Australia, Czech Republic, Malaysia, Thailand, and Saudi Arabia contributed to this conference which made this event an opportunity for international collaboration in academic research.

The conference will motivate and encourage the bright young generation towards research and development in various areas of engineering and basic sciences all the while focusing on sustainability. The conference had 8 keynote lectures, 100+ contributory presentations, and received manuscripts with foreign affiliations.

### BEST WISHES ON RETIREMENT

We appreciate and recognize the loyal services of Mr. M J Vincent, Asst. Prof. (Senior Grade), in the Department of Mechanical Engineering and also in FISAT who retired from service on 9<sup>th</sup> July 2020. Let this new journey bring joy and satisfaction to his life. Best of luck as he begins this fresh chapter.



### THANK YOU MARTIN SIR

You have always been an excellent teacher bringing out the best in students. We thoroughly appreciate the effort you've put into this profession. Thank you for everything and all the best for the career ahead!





## CONGRATULATIONS DR. REJEESH C R FOR YOUR ACHIEVEMENTS

Dr. REJEESH C R received funding of Rs 17,800/- from CATDM as Principal Investigator for the development of a "Portable UV Torch" on 30/10/2020. He has been a Member of the Curriculum Committee at the APJ Abdul Kalam Technological University for the B.Tech Automobile Engineering/Mechanical (Automobile) 2019 scheme from 23.06.2020 to 15.01.2021. He excelled as the resource person for the invited talk (webinar) at Calicut University Institute of Engineering and Technology on the topic "Industry 4.0: An introduction" on 30/11/2020. Also, Dr. Rajeesh C R is a Guest Editor for the Special Issue: i-SMART 2021 in Materials Today Proceedings Journal published by Elsevier.



### PLACEMENT ORIENTATION SESSIONS

The department conducted various placement orientation sessions aimed at grooming the final year students to crack the entrance tests and the following technical and HR interviews. "TCS - Crack It" was session handled by Mr. Shimon P, Developer - Enterprise Intelligent Automation, TCS (MechFISAT15), Mr. Habel Kuruvilla Koshy (MechFISAT16) and Mr. Anil Rajesh (MechFISAT16). A dedicated session for Cognizant was taken by Mr. Govind K (MechFISAT16).



**Mr. Shimon P**  
 Developer - Enterprise  
 Intelligent Automation, TCS  
 (Mech FISAT 15)



**Mr. Habel Kuruvilla  
 Koshy**  
 Former employee, TCS  
 (Mech FISAT 16)



**Mr. Anil Rajesh**  
 Assistant systems engineer-  
 CBO, TCS  
 (Mech FISAT 16)



**Mr. Govind K**  
 Programmer Analyst Trainee,  
 Cognizant  
 (Mech FISAT 16)

### FINDING THE RIGHT CAREER

To facilitate a great career for students of mechanical engineering, the department organized expert talks on job hunting, career and employment.

Mr. Deepak P Bhasi, Fourth Engineer Officer, Anglo-Eastern Ship Management, and presented the opportunities in marine engineering followed by an interactive session with the 3<sup>rd</sup> and 4<sup>th</sup>-year students.

Mr. Kishore Nair, GM, Corporate Sales, Pikkol, gave a talk covering the topics like the thought process behind the first job, resume preparation, how to identify the domain need to go for, reaching out to the right recruiters, defining 5-year goal, backend process of hiring, LinkedIn profile and job portals.

Jobs in the government sector are certainly the most sought after options after engineering. Mr. Sanjay Sanil, Senior Section Engineer, South Western Railways, made a comprehensive presentation on the opportunities in the government sector for a B.Tech mechanical graduate.



**Mr. Deepak P Bhasi**  
 Fourth Engineer Officer,  
 Anglo-Eastern Ship  
 Management,



**Mr. Aravind S Menon**  
 Great Indian Shipping  
 Company, Lonavala  
 Mech FISAT 16



**Mr. Kishore Nair**  
 GM, Corporate Sales,  
 Pikkol  
 Mech FISAT 09



**Mr. Sanjay Sanil**  
 Senior Section Engineer,  
 South Western Railways,  
 Mech FISAT 10



**BEST OUTGOING STUDENT  
S8 ME, 2016 ADMISSIONS**

**BINIL JOHN, S8 ME 16 A**
**OUTSTANDING PERFORMER  
S8 ME, 2016 ADMISSIONS**

**JIDHIN PAUL, S8 ME 16 B**
**ASME Siemens Innovation  
& Young Innovators Programme  
2020**

Mr. T M Akshay, Ms. Namitha Krishnakumar, Mr. Marshal Sebastian and Mr. Ivin Joffy Mathew got selected to the top 16 teams in the Water Challenge of ASME Siemens Innovation for Impact Challenge 2020. The team "Amphitrite" designed an IoT-based water purifier that uses plasma technology and organic

materials for water purification. From more than 100+ teams in the contest, from 34 countries, the team got shortlisted to the second round. The quality and skill of the team are evident as only 3 teams from India progressed to the second round.

The project was presented and got selected for the second level evaluation in the Young Innovators Programme 2020, a specially designed programme under Kerala Development and Strategic Council (K-DISC) to expose young students to the cycle of innovation and to promote a culture of Innovation in Kerala.

**BEST STUDENT PROJECTS OF FINAL YEAR**

- ◆ Project Title: Development of Aluminium 5056/SiC/Bagasse Ash Hybrid Surface Composite Using Friction Stir Processing (FSP).

Project members : AggiyaBen, EldhoPaul, Govind K, Griffon Danty

Project Guide : Ms. Suni Mathai, Asst. Professor (SG), ME

- ◆ Project Title: Effect of interlayer on microstructure evolution and mechanical assessment of keyhole plasma arc welded advanced ultra-supercritical boiler materials.

Project Members : Rahul J Nair, S Yadhu Satheeshan, Jibin Rajeev, Sreyasraj P

Project Guide : Harish T M, Asst. Professor, ME

- ◆ Project Title: Dynamic Table Tennis Training Robot

Project Members : Jidhin Paul, Jeswin Cherish, Kevin Rajan, Vysakh Vinod

Project Guide : Nithin H, Asst. Prof. ME

**NPTEL ONLINE CERTIFICATION**

National Programme on Technology Enhanced Learning (NPTEL) is a joint initiative of the IIT's and IISc. Various courses and certification are offered online through this portal. As a healthy practice, the Department encourage the students to undergo courses of their interests. Many of our students have successfully acquired certification in many courses offered by NPTEL.

Ms. Namitha Krishnakumar, S8 Mechanical Engineering obtained NPTEL Online Certifications for the courses "Fundamental of Manufacturing Processes" conducted by IIT Roorkee and " IC Engines and Gas Turbines" conducted by IIT Guwahati.


**CONGRATULATIONS TO TEAM  
SUSTAINABLE ENGINEERS**

The team 'Sustainable Engineers' with our students Basil Sunny Alukka (S8 ME A) and Issac Paul (S8 ME A) and Dr. Rejeesh C R (ME dept.) as mentor for being selected to the National Convention of 4th AICTE - Chhatra Vishwakarma Awards 2020


**Mr. Marshal S  
S8, ME**

**Mr. T M Akshay  
S8, ME**

**Ms. Namitha K  
S8, ME**

**Mr. Ivin Joffy M  
S6, ME**

that recognize and honour innovative projects from students displaying exceptional skills in different categories. The team was selected after a second round of scrutiny at the AICTE South-West Region and are among the four teams selected from Kerala. They will present their work and compete at the National Convention along with the selected teams from all over India. The convention which was to be held offline at the AICTE, HQ's New Delhi has been scheduled online owing to the pandemic.


**Issac Paul**

**Basil Sunny Alukka**



CONFERENCE PUBLICATIONS

Name	Conference Article Title	Name of conference
Ritwik A., Rejeesh C R	Mechanical property evaluation of elephant dung Fiber based epoxy composites	International Conference on Sustainable materials, Manufacturing and Renewable Technologies (i-SMaRT 2021)
Vivek Vijayakumar, N S Manu, Vasudevan M C, Kiran M V, Rejeesh C R	Phase change materials for improved performance and continuous output in stepped solar stills equipped with HDH	(i-SMaRT 2021)
Tom Anto, C R Rejeesh	Investigations into the tribological properties of Titanium-dioxide alumina coated mild steel	(i-SMaRT 2021)
Sivaprasad S, Sidharth Byju, Prajith C, Jithin Shaju, Rejeesh C R	Development of a novel mycelium bio-composite material to substitute for polystyrene in packaging applications	(i-SMaRT 2021)
T M Harish, Jerin Peter, S Jerome	Effect of Interlayer on keyhole plasma arc butt welded AISI 304 H Austenitic stainless steel high temperature boiler material	(i-SMaRT 2021)
Mathai Yeldose, Tom Joseph, Thomas Mani, Jerin Joy, Reuben Jacob	Review on implementation of Maglev VAD	(i-SMaRT 2021)
Rahul V, Dhanish Jose	Analyzing the influence of non- reported pain and risk experienced by employees in the textile industry	(i-SMaRT 2021)
Arun Kulangara, C.S.P. Rao	Topology optimization of lattice structure on a brake pedal	(i-SMaRT 2021)
Devi Parvathy S, James Varghese	Energy Analysis of a Kalina cycle with double turbine and reheating	(i-SMaRT 2021)
Harish T M, Suni Mathai, Griffon Danty, Govind K, Aggiya Ben, Eldho Paul	Development of Aluminium 5056 / SiC / Bagasse ash hybrid surface composite using Friction Stir Processing (FSP)	(i-SMaRT 2021)
Midhun Paul, Sridharan R, Radha Ramanan T	Scheduling of An Assembly Job Shop: A case study based on Hydraulic Manufacturing Industry	(i-SMaRT 2021)
Anoop Sankar, Sajan S	Manufacturing of High Strength Composites Using Wood as Matrix Phase	(i-SMaRT 2021)
Rajasiva L M, Paul Roy P J, P V Yadu, Joes Tomy	Design, Analysis and Validation of Axial Ventricular Assist Device	(i-SMaRT 2021)
Renjith R, Rajesh P Nair	Mechanical Properties of NFRP materials with silk, bamboo and jute fiber	(i-SMaRT 2021)
Jacob Varghese, Melvin Tom, Sebin Joseph, Sheen Polachan	Design, Analysis and Validation of Left Ventricular Assist Device	(i-SMaRT 2021)
Sajan S, D. Philip Selvaraj	A Review on Polymer Matrix Composite materials and their Applications	(i-SMaRT 2021)
Asulabha Sathyan, Bhadresha K S, Devika Rajan, Reny Mary Destin, Rinku Scaria, Renjith R	An advanced approach for an efficient mode of organ transportation	(i-SMaRT 2021)
Harish T M	Dissimilar heat treated weldment analysis of gas tungsten arc welded mod-9Cr - 1 Mo steel (P91) to Incoloy 800 H advanced power plant materials	National Conference on advancements in material processing technology AMPT 2020 at National Institute of Technology, Jamshedpur, Jharkhand



**KTU RESEARCH SEED MONEY**

The project "Development and Management of Waste Cooking Oil (WCO) Bio - Diesel Engine with Ion Sensor Technology" guided by Dr. Sumanlal M R, Associate Professor, ME Dept. is selected for KTU research seed money presentation.



**ALL INDIA RANK - 345**

Abhijith J Kumar  
MECH FISAT 2015-2019

Congratulations on your achievement!  
You have made us all proud.



**CONGRATS VARUN S, S4 ME B**

On securing 10 grade points in KTU Second Semester Examinations May 2020.



**GATE - 2021**

Mechanical Engineering  
All India Rank - **184**

Harikrishnan J  
M.Tech, Cryogenic Engineering

IIT Kharagpur  
MECH FISAT 2012-2016

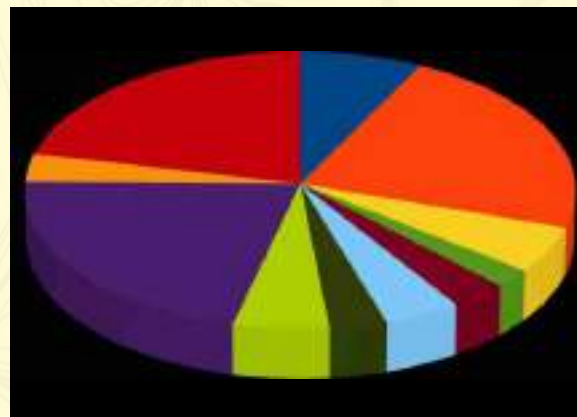


**JOURNAL PUBLICATIONS**

Name	Article Title	Name of journal with Issue and page number
Joyal Jose, K N Uvais, T S Sreenadh, Ashwin V Deepak, C R Rejeesh	Investigations into the development of a mycelium biocomposite to substitute Polystyrene in Packaging Applications	Arabian Journal for Science and Engineering. 46 (3), 2975–2984. (2021). <a href="https://doi.org/10.1007/s13369-020-05247-2">https://doi.org/10.1007/s13369-020-05247-2</a>
Sooraj R Menon, Rejeesh C R.	Improved Thermal stability of Boron treated Coir MDF boards.	Journal of Polymer & Composites. 8(2): 33–40p. (2020),
Amal Ramesh, Joseph Davis, Rejeesh CR.	Development and Performance Assessment of a Prototype Zeer-Pot Refrigerator	Journal of Alternate Energy Sources & Technologies, 11(2): 41–45p. (2020),
Harish T M , Jerin Peter	Effect of interlayer on keyhole plasma arc butt welded AISI 304 H austenetic stainless steel high temperature material	Elsevier, Materials Today : Proceedings, 2021, ISSN 2214-7853 <a href="https://doi.org/10.1016/j.matpr.2021.04.325">https://doi.org/10.1016/j.matpr.2021.04.325</a>

**CSE FACULTY DEVELOPMENT PROGRAMS (Academic Year 2020-2021)**

Domain	Count
Applied Compting	7
Artificial Intelligence	21
Computing Methodologies	5
Human Centered Computing	2
Information Systems	3
Internet of Things	4
Networking	3
Programming	5
Recent trends in Research	20
Security and Privacy	3
Social & Professional Topics	20



- Applied Compting
- Artificial Intelligence
- Computing Methodologies
- Human Centered Computing
- Information Systems
- Internet of Things
- Networking
- Programming
- Recent trends in Research
- Security and Privacy
- Social & Professional Topics



## INDUCTION PROGRAMME ON ASME at ILMCET

An induction programme on ASME was conducted on 06/12/2020 at 4 pm for the Students of ILM College of Engineering and Technology.

The Induction programme was initiated after a Talk on the Application of Computational Fluid Dynamics by Dr. K E Reby Roy and the induction programme brought in with a view to uplift the level of awareness of students on ASME to an elevated stage. The session was taken by the executive committee members of the ASME FISAT Student chapter, Mr. T M Akshay, Chairman ASME FISAT, Mr. Bain T Baiju, Joint committee chairman ASME FISAT

Mr. Ivin Joffy, Secretary ASME FISAT, Mr. Deepak V P, Convener ASME FISAT. The Programme started with a detailed introduction on the missions and membership benefits by Mr. T M Akshay and later Mr. Ivin Joffy talked about the structure of the ASME Board and the initiatives. Later Mr. Bain T Baiju carried over the topic into the programs and competitions and Mr. Deepak V P Conveyed the idea of IMECE and how to start the chapter.

## INDUSTRIAL TALK ON STANDARDS

ASME FISAT student chapter conducted an industrial talk on the topic STANDARDS by Mr. K T Jose Managing director HEMAN ROBOPARK on 30 October 2020 via online platform Google meet. It was an expert talk where over 82 students actively took part in the event and gained lots of information. The talk mainly focused on how Standards vary for different countries, different types of nuts, types of spanners and their uses, different welding methods and precautions to be taken. Mr. Jose shared his life-changing success stories with us and motivated us to gulp every essence of knowledge that we can gain. He encouraged us to be enthusiastic and to have quench for ideas, also without any hesitation answered all our queries. His simple and informative words made this session interesting and productive. Being a part of this talk motivated and encouraged our engineering undergraduates to be a step closer towards their successful life.

## Solid Works Training Program

ASME FISAT student chapter successfully conducted a two day 'SolidWorks Training Program' coordinated by Mr. T M Akshay via Google meet on 14 November and 15 November 2020. More than 20 students actively participated in this event. The event was focused on enhancing our 3D modelling skill and learning Solidworks from basic sketching to assembling. The whole session was interactive where the participants were able to clarify their doubts regarding the software. In the end, all of the participants were able to create their SolidWorks project and successfully acquired a detailed idea regarding the software and its benefits.

## ENVIRONMENT DAY 2021

On June 5th, the Mechanical Department of FISAT in support of ASME FISAT celebrated world environment day with various virtual programs and competitions based on environment and nature.

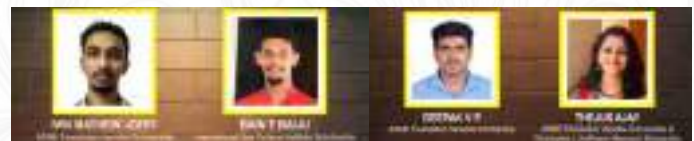
A Hands-on workshop "PUNERJENI" on sustainable recycling was conducted on June 5th via the Zoom platform. The resource person Mr. Amal Shaji, an alumnus of FISAT and a well-known craft designer, shared his talent in craft making, followed by the craft competition "PUNERJENI". An online photography contest "ART OF NATURE" based on the theme "NATURE" with a prize worth Rs. 500 was conducted from June 4 to 7. As part of the campaign "PLANT AND NURTURE", every Fisatian pledged to plant at least one tree and nurture it.



## ASME SCHOLARSHIPS 2021-2022

Selection results of ASME Scholarships 2021-2022 were announced on 11/06/2021 and 4 students were awarded different scholarships worth a total of around 6 Lakh.

1. Deepak V P - ASME Foundation Variable Scholarship
2. Ivin Mathew Joffy - ASME Foundation Variable Scholarship
3. Bain T Baiju - International Gas Turbine Institute Scholarship
4. Thejus Ajay - ASME Foundation Variable Scholarship & Christopher L. Hoffmann Memorial Scholarship



## DONATION CAMPAIGN FOR ORPHANAGE, AZHAKAM

Students came up with support and interaction program for the children in an orphanage, near Azhakam for their education, and expenditures. On January 30th, 2020 representing the Mechanical Department, Mr. Deepak VP, S6ME, Ivin Joffy, S6ME, Bain T Baiju, S6ME, Antony Francis, S6ME, Bilton Baiju, S6ME along with Mr. Sajan S, Asst. Prof. ME and Arun J Kulangara, Asst. Prof. ME interacted with the members. Students pledged their support to continue the activities. Mr. Varghese Thudian, who oversees the activities of the orphanage was present.





## ACCTHPA 2020-THE FIFTH INTERNATIONAL CONFERENCE

ACCTHPA 2020, the fifth International Conference on "Advanced Computing and Communication Techniques for High Performance Applications (ACCTHPA)" was a prime conference that provides a forum to bring together the researchers from academia and industry to convene and swap over the ideas and recent research work on the High Performance Applications. ACCTHPA was conducted on July 2-4, 2020 at Federal Institute of Science And Technology (FISAT). **Dr. S. D. Madhu Kumar, Professor of CSE Dept. & Dean (SW), NIT Calicut** inaugurated the conference and gave a keynote address on the first day. FISAT Chairman Dr. Anitha P. presided over the function. The other keynote speakers were **Mr. Fabin Rasheed, Pretia, Japan** and **Mr. Sreelal T S, Program Director, Tata Electric Vehicle charging network, TCS**. The Conference turned out to be a great Success and the entire event was coordinated by Dr. Prasad J C, Dr. Arunkumar M N, Dr. Jyothish K John, Dr. Paul P Mathai and Dr. Jestin Joy. Due to the covid pandemic conference was hosted online. ACCTHPA was organized in association with IEEE Kerala Section. All accepted and presented papers were published in IEEE Xplore. The theme for the conference was "Latest trends in human centered HPC applications". Event turned out to be a great success and 48 papers were presented in the conference and published. Dr. Jestin Joy, Asst. Professor, CSE Dept. was the Guest Editor of the Publication of the Proceedings.



### KEYNOTE SPEAKERS



**Dr. S. D. Madhu Kumar**  
 Professor of CSE Dept. & Dean (SW),  
 NIT Calicut  
**Cyber Security and Dark Web.**



**Mr. Fabin Rasheed**  
 Pretia, Japan  
**Creating for creating.**



**Mr. Sreelal T S**  
 Delivery Head, Strategic Program, TCS  
**Industry Adoption of Human Centered Design**



### MACHINE LEARNING USING TENSORFLOW 2.0 3

Dr. Sreeraj M. delivered an interesting talk on Machine Learning using TensorFlow. This workshop covered the basics of TensorFlow 2.0 and Machine Learning. It also addressed image processing applications using TensorFlow 2.0.

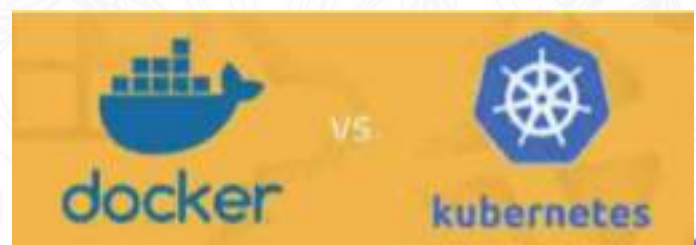


### WORKSHOP ON DOCKER AND KUBERNETES

An enlightening session on DOCKER and KUBERNETES was handled by Mr. Johny James and Mr. Midhun K. A. Docker is widely used in industry and it provides virtualization capabilities. It is used to run software packages called "containers". It was originally designed by Google. Kubernetes is widely used in industry for automating application deployment.

### INTRODUCTION TO "GO" PROGRAMMING LANGUAGE

A practical session on "Introduction to Go programming language" was taken by Mr. Noufal Ibrahim. The session covered a quick introduction to "Go" and its main features including the concurrency primitives called "GoRoutines".





## ICEFOSS 2021

9<sup>th</sup> National conference on Free and Open Source Software (ICEFOSS 2021) was held on 30<sup>th</sup> and 31<sup>st</sup> January 2021. The Conference covered different aspects of Free Software through online mode. **Dr. Rajan Gurukkal**, Vice Chairman of Kerala State Higher Education Council inaugurated the Conference. Many eminent speakers conducted workshops and classes. The Special guest was **Mr. Timothee Giet** (GCompris maintainer and Graphic Artist). Different sessions were handled by Ms. Aiswarya, Mr. Pankaj Kumar and Mr. Krishna Bhat. There were a large number of registered participants for the Conference. The faculty in charges of ICEFOSS was Ms. Merin Cherian and Dr. Jestin Joy.



### NATURAL LANGUAGE PROCESSING



Sessions on Natural Language Processing was taken by Mr. Adam Shamsudeen. He solved simple tasks using natural language processing. The feedback received from the participants was highly appreciable.



### BEST MAIN PROJECTS

Assistive  
Humanoid Robot  
for the elderly

Meta -  
"Heuristic Algorithms for Global  
Optimization"



**Job Jacob,  
S8 CSE B**



**Abhijith P, Aswin Kumar K S  
and Dileep Vijayakumar (S8 CSE A)**

### VIRTUAL PROJECT EXHIBITION 2020

The Department of Computer Science and Engineering conducted a virtual project exhibition for the students to exhibit their ideas and solutions. It was inaugurated by Dr. George Issac, Principal.



This initiative focuses on enhancing the learning opportunity to the students of CSE Department of FISAT with guidance from well supported faculty in dynamic learning environments. [www.csproject.fisat.ac.in](http://www.csproject.fisat.ac.in)

### BEST DESIGN PROJECTS

"Video Transcription  
using Segmented  
Keyframe Extraction"

"Recommender System",



**Linda Joy, Maria Sajan,  
(S6 CSE B)**



**Liya Laiju, Saurav N S, Rishad  
S6 CSE B**

### POPULAR PROJECT

"Data Slicer",



**Paul Antony, Mohammed Zeeshan, Shreya Kulangara,  
Zachariah Joshy (S8 CSE B)**

### SMRITHI 2020 COMPETITIVE PROGRAMMING CONTEST

First Prize : Mr. Abijith Pradeep, S8 CSE  
Second Prize : Mr. Paul Antony, S8 CSE B  
Third Prize : Mr. S Krishna Bhat, S6 CSE B

### ARTECH TECHNICAL WRITING CONTEST

First Prize : Ms. Sanika T C, S2 CSE B  
Second Prize : Mr. Basil Leju, S4 CSE A  
Third Prize : Mr. Joseph Shaju C, S2 CSE B



## MANTRA 2020

The Annual CSE Day-Mantra 2020, was conducted in an impressive manner on July 29<sup>th</sup> 2020, in association with THYRA, the students association of Computer Science and Engineering Department, FISAT. This year, amidst the current pandemic situation, the event was successfully conducted through a digital platform. It included a week-long engagement of coding contest, quiz, cultural competitions, MEAN stack workshop, Alumni interactions, technical talk and a project expo exhibited by the students of final year and third year. Mr Yathin Kizhakekkara was chosen as the best outgoing student.



### PV MATHEW MEMORIAL DEBATE COMPETITION

CSE department, in association with THYRA-CSE student association conducted a debate competition in remembrance of Shri P V Mathew on 27<sup>th</sup> September 2020. Ms Sanika T C of S3 CSE B and Mohammed Shehzad Hanif of S5 CSE B won the First and Second prize respectively.

### HACK LIFE FOR FREE

The FISAT Free Software Cell Conducted a workshop “Hack Life for FREE”. It was a Three Days Workshop on Free and Open Source Software focused on the First Year students. The meeting discussed the importance of FOSS and FOSS alternatives.



### CELESTIA 2020

An intercollegiate quiz competition was conducted by ACM, student chapter, FISAT on 29<sup>th</sup> July 2020.

First Prize:  
**Mr. S Krishna Bhat (S7CSB)**  
 Second Prize:  
**Ms. Malini S Rao (S7 CSB)**



### Gate Qualified Students (2016-2020 Batch)

Ms. Anjana Lakshmi-S8CSE A, Mr. Anush S-S8 CSE A

### PANEL DISCUSSION WITH ICT ACADEMY OF KERALA

Three students from each class participated in an online panel discussion on the future career opportunities in IT, organized by ICT Academy of Kerala, supported by Amazon, TCS, EY, InApp, KTU and Govt. of Kerala on 8<sup>th</sup> May 2020. Major discussions were changes for the students and education institutions in the unprecedented time. The team also discussed the recruitment's future of jobs; working environment in companies and so on. It was a very beneficial talk for the students.

### FAREWELL PROGRAM

Like every year's traditional farewell programme for the pass out students, this year due to the pandemic situation, an online farewell function was arranged to our 2016-2020 batch students on 1<sup>st</sup> August 2020.

Faculty members and students shared their experiences in the college. Faculty shared blessings and various guidelines on how to move forward and be successful in life

Ms. Mareena Mathews and Mr. Arun step down from our department during this academic year. The CSE Department wishes both of them success in all their future endeavors.

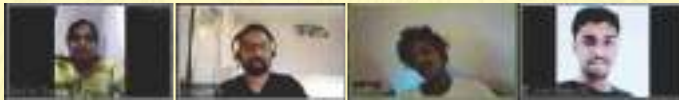




## WEBINARS CONDUCTED

Our Students actively participated in the webinar conducted by ACM India on 19<sup>th</sup> May, 2020 by **Mr. Navin Kabra**, Cofounder and CTO of ReliScore on the topic “Common mistakes in campus tests and job interviews”. **Mr. Shekhar Sahasrabudhe**, Chief Operating Officer of ACM hosted the session. The main objective of the webinar was to cover some of the most important areas where students commonly fall short, including practical aspects, writing good SQL queries, using the right data-structures in different situations, and other such issues.

A webinar was conducted on JUNE 26, 2020 by ACM Student Chapter, FISAT on the topic “Future of Work: Opportunities and Challenges” by **Mr. Sreejith K**, Senior manager, CTS, California. The focus of the webinar was to imbibe knowledge about the various opportunities a B. Tech Computer Science graduate has in his career.



An industry interaction was organized on 28<sup>th</sup> JULY 2020 in connection with Kerala Blockchain Academy on the topic “Introduction to Digital Twin & its Applications” by **Mr. Bibin Manuel**, Lead-Microsoft Azure COE, TCS.



A talk on the topic “Introduction to Blockchain and Hyperledger Framework” was conducted by **Mr. Parthiban Selvaraj** on 6<sup>th</sup> and 7<sup>th</sup> AUGUST 2020. He is a certified Blockchain Architect Researcher and Design Thinking Practitioner at TCS.

A talk was conducted on 29<sup>th</sup> JULY 2020 in association with Thyra on the topic “Building Expectations and Building Professional Competencies” by **Mohammad Farhan**, Alumni and Security Consultant at Synopsys, SIG, Bengaluru. He shared his industrial experiences and his view to build professional competencies among employees



CSI Student Branch, FISAT hosted a webinar on “Web App Development using Bootstrap and Hosting” on 24<sup>th</sup> July by **Mr. Anish S Nair**, Co-Founder & CEO, Logix Space. The webinar focused on how to build fast, responsive websites using Bootstrap.

Department of Computer Science And Engineering in association with Computer Society of India (CSI) student branch conducted an interactive talk by alumni **Mr. Ashwin Kurian Wilson** on the topic "Digital Designing". Talk was conducted on August 8<sup>th</sup>, 2020. **Mr. Ashwin** gave an insight into the various courses which can be opted by computer science graduates for doing Masters in Design.



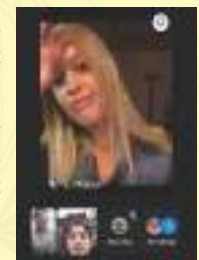
A webinar on Free introductory classes on the topic “AI: Stepping into the future” was organized by CSE department in association with FFSC, FISAT on 9<sup>th</sup> August 2020.



A webinar was organized by CSE dept, FISAT in association with IIT Roorkee & Wiley on “Post graduate certification in AI for BFSI” on 21<sup>st</sup> August 2020.

CCRC conducted an Online MEETUP and workshop “HACKTOBERFEST” on 10<sup>th</sup> October as part of the International Annual Hacktoberfest Challenge, as an effort to introduce and encourage students to take part in FOSS activities and contribute to open source projects. **Mr. Jacob Herrington**, Springdale, AR USA was the chief guest.

A hands-on workshop 'VIZIA' on Computer vision using fast AI by **Ms. Lauren Pfeifer**, Data scientist San Francisco, California on 21/11/2020. She's the one who leads the AI project for the world economic forum's global shapers hub in San Francisco, which built a global community of next generation leaders in AI and has launched a public engagement survey on youths' perception on AI.



Kerala Blockchain Academy Innovation Club (KBAIC) in association with Dept of CSE conducted a “Hands-on workshop on blockchain” by **Mr. Melwin Sunny** and **Ms. Lekshmi K B**, Research and Development Engineer, Kerala Blockchain Academy on 23<sup>rd</sup> November 2020.

On 12<sup>th</sup> December 2020, ACM Student chapter conducted Hour of code for the students of St Paul's International School, Kalamassery. ACM members took class on Scratch Software and about 25 students of 7<sup>th</sup> standard of the school attended the session. The participants were awarded with online certificates





Web Development Bootcamp for FISATians was conducted by ACM Student chapter on 19<sup>th</sup> and 20<sup>th</sup> December 2020. The session was handled by our CS Alumni, Mr. Mohit Rajan E.

Every year FISAT Free Software Cell conducts an introductory class for the newly joined first year students. This year they conducted an introductory class on 28<sup>th</sup> December. All the students actively participated and interacted for the class.

ACM Student Chapter FISAT, organized an Ask Me Anything session on the 11<sup>th</sup> of May, 2021. The session was handled by Mr. Rahul Maheshwari (Solutions engineer-Cloud Architect, Google, Bangalore).



## EDX & WEBEX

All the members of the CSE department switched on to the Edx platform due to the Covid pandemic this year. Mr. Mahesh.C, Assistant Professor of CSE Department gave training to all the staff members of the college on how to use the Edx platform. All the members of our department shared their Course Materials and even their recorded videos through this platform. Any issues in the usage of Edx and Webx platforms were addressed by Mr. Rajesh. T.R and his team.

## STAFF PUBLICATIONS

**Dr. Arun Kumar M N**, "Ocean Surface Features Extraction using Morphological Techniques from Sentinel-1A Data", Volume 5

**Dr Paul P Mathai**, "An enhanced fusion based region selection of co-salient detection", International Journal of Advance Research and Innovative Ideas in Education, Volume 6, Issue 3

**Dr. Paul P Mathai**, "A New Approach for Developing SMART DEPARTMENT" in International Journal of Research in Engineering and Science (IJRES)

**Dr. Jestin Joy and Sreeraj M**, "A machine learning based framework for assisting pathologists in grading and counting of breast cancer cells." ICT Express (2021).

**Dr. Jestin Joy**, Kannan Balakrishnan, and Sreeraj Madhavankutty. "SignText: a web-based tool for providing accessible text book contents for Deaf learners." Universal Access in the Information Society (2021): 1-7.

**Dr. Jestin Joy**, Kannan Balakrishnan, and Sreeraj Madhavankutty. "A Novel Web Based Dictionary Framework for Indian Sign Language." SN Computer Science 2.3 (2021): 1-7.

**Ms. Hema Krishnan**, M. Sudheep Elayidom, and T. Santhanakrishnan. "Optimization Assisted Convolutional Neural Network for Sentiment Analysis with Weighted Holoentropy based Features", International Journal of Information Technology & Decision Making (2021): 1-37

The talk on 'Life of a Data Engineer', hosted by the THYRA CSE association, was held on 29<sup>th</sup> March 2021 for the final year students of Computer Science batch. The speaker for the session was Mr. Nithish R, alumni of FISAT. The talk had covered the role of a data engineer, including why companies need them, how they work and an overview of some of the skills required for this role.

Department of Computer Science And Engineering in association with Computer Society of India (CSI) student branch, FISAT hosted a webinar on "Basics of elliptic curve" on 4<sup>th</sup> February, 2021. Resource person for the event was Dr. Anilkumar M N, Professor, Dept. of ECE, FISAT. The webinar focused on various concepts like groups, fields, hard problems in cryptography which enabled the participants to gain a better understanding of the underlying process in elliptic curve.

A talk on "DATA COMPRESSION: What. Why. How?" was conducted by the CSI Cochin Chapter and CSE Department, FISAT on 8<sup>th</sup> January 2021. Dr. Arun Kumar M N, Professor, CSE Department, FISAT was the resource person for the same.

## CONFERENCES

**Dr. Arun Kumar M N**, "Extraction of Layered Information from Satellite Image", National Conference on Recent Trends in Engineering and Technology, Malabar Institute of Technology, Kannur.

**Paul P. Mathai**, Valsan, Vidhu, and Ierin Babu. "Monitoring Driver's Drowsiness Status at Night Based on Computer Vision." 2021 International Conference on Computing, Communication, and Intelligent Systems (ICCCIS). IEEE, 2021.

**Ms. Chethna Joy**, "AI Driven Automatic Detection of Bacterial Contamination in Water: A Review", 5<sup>th</sup> IEEE International Conference on Intelligent Computing and Control Systems (ICICCS 2021), Marurai, May 2021.

**Krishnan, Hema**, et al.: A Novel Underwater Image Enhancement Technique using ResNet", 2020 IEEE 4<sup>th</sup> Conference on Information and Communication Technology (ICT), IEEE, 2020.

## PAPER PRESENTATIONS BY STUDENTS

**Anjana lakshmi, Athira C H, Anamika LS, Alaikha PV** presented paper "Survey on Novel Image Enhancement Techniques" in international Colloquium on Recent Trends in Engineering 2020

**S Krishna Bhat** presented a paper titled "SRL Video Recommender for Syllabus Driven E-Learning Platforms for Virtual International Conference Futuristic Communication And Networking Technologies on November 2020

**P Sunitha, Pooja Susan Korah, Therus Martin** presented a paper titled "Dynamic Multi-Heuristic A-star approach for Optimal Map Navigation" in the International Conference on Advances in Computing, Communication, Embedded and Secure Systems (ACCESS'20) organized by Department of Electronics and Communication Engineering, Adi Shankara Institute of Engineering and Technology during May 28<sup>th</sup> to 30<sup>th</sup>, 2020



## STAFF ACHIEVEMENTS

### CONGRATULATIONS Dr. JESTIN JOY AND Dr. RESHMI R

Dr. Jestin Joy was awarded the degree of Doctor of Philosophy under the faculty of Technology, CUSAT for the thesis entitled “Design and Development of Assistive software tools for improving the effectiveness of Sign Language Based Learning”.



Dr. Reshmi R was awarded the degree of Doctor of Philosophy under the faculty of Engineering, Anna University, Chennai for the thesis entitled “QoS Oriented Dynamic and Energy Aware Resource Allocation Schemes for High Performance Computing Clouds”.



#### Dr. JYOTHISH K JOHN

- ◆ “AWS” ACADEMY ACCREDITED FACULTY - Successfully earned AWS Academy accreditation. He is now approved to teach the AWS Academy Cloud Foundations courses.

#### Dr. PRASAD J C

- ◆ KTU has selected to the Panel of International Judges for International Finastra Hackathon
- ◆ Reviewer for International Conference on Computational Sciences- Modelling, Computing and Soft Computing (CSMCS-2020) during 26-29 March 2020 by Department of Mathematics, National Institute of Technology Calicut, Kerala
- ◆ Conducted an Invited Talk at NICaT, at Trichur.
- ◆ General Program Chair, and Chief organizer for the fifth international conference ICACCTHPA-20, held at FISAT
- ◆ Institute Representative of IIT-M for NPTEL examinations on Dec2020 and Feb 2021
- ◆ Successfully completed 9 Training Courses on Industry 4.0 Technologies from reputed organizations in the academic year 2020-21.

#### Dr. ARUN KUMAR M N

- ◆ Technical Program Chair, and one of the organizers for the fifth international conference ICACCTHPA-20, held at FISAT
- ◆ Two Joint Publication/Research activities with NPOL, Kochi
- ◆ Session chair for ICRTST 2020, ATMECE, Mysore
- ◆ Session chair for the conference: Virtual International Conference on Energy, Environment and Health (INFOFEST 2020) SREE AYYAPPA COLLEGE, Eramalikkara, Chengannur, Alappuzha District.
- ◆ Reviewer for ICRTST 2020, ATMECE, Mysore
- ◆ Reviewer for ICACCTHPA-20, FISAT, Kerala
- ◆ Deputy Presiding officer at FISAT for JAM-2020
- ◆ External Examiner for Ph.D viva voce examination, VTU, Research centre: RV college of engineering, Bangalore
- ◆ Submitted one RPS to AICTE (Nov 2020).

#### Dr. PAUL P MATHAI

- ◆ WIPRO CERTIFIED FACULTY -Successfully passed the TalentNext Java certification by WIPRO Technologies and is a recognised Mentor for "Project Based Learning - PBL" in Java J2EE
- ◆ A Patent entitled "An automated Methodology and System to Manage the Student Related Information Efficiently" was published in the Indian Patent Journal during June 2020. Patent Application Number: 202041021480A. Publication Date: 05/06/2020
- ◆ Selected as an External Academic Auditor of Kerala Technological University and Conducted audit process at College of Engineering, Cherthala and SNGIST Group of Institutions, Paravoor.
- ◆ Received “Innovative Research & Dedicated Teaching Professional Award” from The Society of Innovative Educationalist & Scientific Research Professional Chennai during 2020.

#### Mr. PANKAJ KUMAR G

- ◆ The team led by him Received Best Paper Award for paper titled "Sustainable and Collaborative Automated Farming Technology with LoRa", NCECC-2020: National Conference on Electronics, Communication and Computation, NIT Jamshedpur, September 2020. The team includes Shemin Anto, S Krishna Bhat, Keerthana Krishnakumar, Sherin Shaju, Narayanan V Eswar .



**Mr. ANURANJ P**

- ◆ Conducted ASAP, online classes on the topic interrupt handling in RTOS Environment to all KTU students on 11<sup>th</sup> May 2020

**Mr. MAHESH C**

- ◆ Conducted ASAP, online classes for the subject Principles of Information Security to all KTU students.

**Dr. JESTIN JOY**

- ◆ Handled a class on “Python for beginners” for the CSI Cochin chapter on November 21<sup>st</sup> 2020

**Ms. RESHMI R**

- ◆ Got 100 % result for Graph theory and combinatorics in S6 CSB

**STUDENT'S ACHIEVEMENTS**

- ◆ Mr. Kiran Baby, Mr. Nelvin Poly, Mr. Sahal S K and Mr. Rahul M M (S8CS B) secured 3rd position in the competition named Game Begetter conducted by IIT Bombay. The Genre of the game created is Endless runner and the platform used was Android
- ◆ Malavika Rajeev was selected as best performer in the CODEQUEST contest (Quiz on C Programming) conducted by Department of CSE, Sri Eshwar College of Engineering, Chennai. On August 8th 2020
- ◆ Sreelakshmi Vinod (S1 CSEB) Hritwik N E (S3 CSEA) has passed the Qualifier Exam conducted by IIT Madras for its online B.Sc in Programming and Data Science.
- ◆ The team including Abijith Dileep, Vijayakumar, Aswin Kumar K S, Anagha Zachariah (S8 CSA) got Runner up in 7th national Level Technical project Exhibition & Competition 2020.
- ◆ Basil Sajeew Areekal(S3 CSA) has secured third prize in the SENTIA competition conducted as a part of COGNIZANCE 10.0
- ◆ Anagha Jayaraj (S6 CSA) secured first prize for the event MINDBEND conducted by Muthoot Institute of Science and Technology and secured third prize in the “TECHNOPHILIA” technical quiz competition conducted by FISAT IEEE Student branch.
- ◆ Maria Sajan(S7 CSB) qualified second round of National Engineering Olympiad 3.0 with rank 87 conducted by NEO Foundation.
- ◆ R Vysakh (S7 CSB) was recognized as an awesome mentor in the ORE program of IEEE Kochi Hub. He was also a mentor for App Development in the Outreach for Resources in Engineering Program conducted by IEEE Kochi during August- November 2020.
- ◆ Mohammed Hashim (S7 CSB) has secured First prize in the Lol.code (coding contest) hosted by IEEE Student Branch RSET as a part of IEEE Kochi Hub Inter Student Branch Cluster Competition.
- ◆ Nandini Menon (S8 CSB) completed her internship in CommVault Systems Pvt Ltd for 2 months.
- ◆ Lakshmi Shaju (S4CSB) secured first prize in the COGNIANCE 10.0 STELLAROID competition and second prize in the “TECHNOPHILIA” technical quiz competition conducted by FISAT IEEE Student branch.
- ◆ Rosmi Johnson (S4CSB) secured first prize in “Doodle” contest organized by WIE AG, Kerala section and second prize in “Krossword” contest by IEEE student branch, Amaljothy College. She is the documentation head of IEEE FISAT student branch and also a part of design team in IEEE WIE Kerala section.
- ◆ Rohit George (S4CSB) is holding the Execom position of Membership Development Vice chair in IEEE FISAT Student branch.
- ◆ R Sreyas (S4CSB) is selected for the design team of IEEE WIE Kerala section and also holding the Execom position of Design Head in IEEE FISAT SB.
- ◆ Ashwin S (S4CSA) secured second prize in the “TECHNOPHILIA” technical quiz competition conducted by FISAT IEEE Student branch
- ◆ Aneeka Geo (S4CSA) secured second prize in the COGNIANCE 10.0 STELLAROID competition conducted by IEEE FISAT SB
- ◆ Pranoy Lloyd Joseph (S4CSB) secured third prize in the COGNIANCE 10.0 STELLAROID competition conducted by IEEE FISAT SB
- ◆ Mr. Aman Jose (S1CSA) has represented MATHS CLUB FISAT in the All Kerala Intercollegiate Mathematics Quiz Competition held at K E College, Mannanam on March 11, 2021. He secured first position in the competition.
- ◆ Ms. Aparna V (S6 CSA) secured third prize in Scilpt Enhavo, content writing competition, conducted by IEEE SB, Jeppiar Engineering College during the Month of April, 2021.
- ◆ Ms. Ayisha E A (S4 CSA) secured first prize in Picture Puzzle competition, conducted by IEEE SB, Jeppiar Engineering College during the Month of April, 2021.



## UNIVERSITY RESULTS

### CONGRATULATIONS!

36 CSE Final Year Students of 2016-2020 Batch with CGPA 8.0 and above.

CONGRATULATIONS for SECURING 10 GRADE POINTS in KTU 2nd SEMESTER B. TECH DEGREE EXAMINATIONS, MAY 2020



APARNA JOSHI  
(S2CS-A)



ASHMI SUBRAMANIAN  
(S2CS-A)



HASEEN FAIRUZ A R  
(S2CS-A)



LAKSHMI SHAJU  
(S2CS-B)



MARIA SIBI PHILIP  
(S2CS-B)



NISHA BASIL  
(S2CS-B)



SAM VARGHESE  
(S2CS-B)



VINAYAK N  
(S2CS-B)

### First Year (2019 Academic Year)



SWETHA R



EMMANUEL J



ANGELS



SIVADA K M

### Second Year (2018 Academic Year)



RITIKA LIZ B



ARUNIMA RAJ



ATHULYA K B



DEVU R KURUP



VISRUTHA A R



KEERTHANA K

### Final Year (2016 Academic Year)



NOUSHEEN S



GAYATHRI S



SWATHI S



ANJANA L



AMEESHA P K

### M. TECH CSIS



## SECON'21

The Department of Civil Engineering of FISAT has been on the forefront since 2017 for moulding out the most illustrious International Technical conference in Kerala and SECON has turned out to be the best platform for knowledge exchange. From 2020 due to the covid restrictions the conference was conducted in the online mode. Moving against the odds the fifth



edition of the International conference on 'Structural Engineering and Construction Management' (SECON'21) was held fully online in WebEx platform from 12<sup>th</sup> to 15<sup>th</sup> of May 2021.

As the curtains fell there was a sense of achievement as the keynote speakers, chairs, co-chairs, authors, participants, each and every one who associated with the conference expressed their appreciation for maintaining the quality and executing it in the best possible way. The highlight of this year's conference was the presence of 6 international speakers. (<https://secon21.fisat.ac.in>)

Dr. Mohammad Najafi, Professor, The University of Texas at Arlington, Texas, USA, Prof. Giuseppe Carlo MARANO, PhD Chair of Structural Engineering Politecnico di Torino, Italy, Prof. Ranjith Dissanayake, Senior Professor University of Peradeniya, Sri Lanka, Dr. Arjun Jayaprakash, Senior Earthquake Engineer, Karen Clark and Company, Boston, Massachusetts, Prof. Ir. Ing Serge Vandemeulebroecke, and Independent Consulting Engineer ExSV bvba, Belgium, Prof. Usama Ebead, Professor of Structural Engineering Department of Civil and Architectural Engineering Qatar University were the International keynote speakers.

The subject varied from trenches technologies, to machine learning to structural health monitoring and earthquake risk assessment. This year also Springer is associating with SECON for publications. There was an overwhelming response to the call for paper. With nearly 400 submissions, it was a herculean task for the committee to review and finally accept 100 papers for presentation and publication. There were more than 100 reviewers, both from academia and industry. The papers were presented in 27 sessions during the four days of the conference. It was not an easy feat, the entire team of faculty members, student volunteers worked tirelessly for months to execute it. The hurdles posed by the pandemic and unfavorable weather conditions were managed by the team in a perfect manner. The association with professional bodies like ASCE, ISTE, ICI, IE and Paradigm made the conference special.

The event was a success, thanks to the organising committee team that backed the whole process which dates back many months prior to the conference. The organising committee members were Dr. Unni Kartha G, General Convenor, Head of Department, Dept. of Civil Engg, Ms. Rajalakshmi T R, Convenor, Assistant Professor, Ms. Reshma Prasad, Convenor, Assistant Professor, Dr. Asha Joseph, Program Chair, Associate Professor, Dr. Kavitha P E, Publications Chair, Associate Professor, Mr. Jawahar Saud S, Publicity & Public Relations Chair, Assistant Professor, Ms. Rinu J Achison, Finance Chair & Treasurer, Assistant Professor Dept. of Civil Engg, FISAT

The seamless coordination of the Civil Department faculty and student volunteers from B.tech and M.tech made the process even smoother and also drew positive feedback from the external participants praising the smooth conduct of the conference.



## LUDO COMPETITION

To raise the spirits during COVID-19 pandemic and subsequent lockdowns, it was decided to conduct an online LUDO competition, which was a rage during the time. It was held to bring the student fraternity together in an engaging and fun way. The event was conducted on the 13<sup>th</sup> May 2020 and saw 28 student participants. There were 11 different rounds to find the winner. Akhila PV (S8 CE) successfully bagged the first position with a cash prize, followed by Nasrin KN (S2 CE) who came second and Sidharth Akhil (S6 ME) who secured the third position.





## WEBINARS

### WEBINAR ON “SIGNIFICANCE OF CIVIL ENGINEERING AS A PROFESSION”

A webinar on 'Significance of Civil Engineering as a Profession' by Er. Suryaprakash, Founding trustee of smart infr-EST was conducted on 22<sup>nd</sup> of May 2020. It was organized by Construction Philosophy, which is India's newest Civil



Engineering & Construction Magazine in association with ASCE student chapter FISAT. Mr. Suryaprakash stated “An engineer should be an engineer, not a politician or businessman”. He emphasised on the need for civil engineers to focus on career and quality. He also provided awareness about career options and future needs of the construction industry. The event concluded with a final note from Er. Shyju Nair, Concrete Expert and CEO of DH Academy. He addressed the students about the importance of training oneself to be a professional. A total of 88 students participated in the event using the ZOOM platform.

### WEBINAR ON “ENVIRONMENTAL IMPACT ASSESSMENT”



ASCE student chapter FISAT and KSCSTE Centre for Water Resources Development and Management (CWRDM) jointly organised a webinar on the topic “Environmental Impact Assessment process with special reference to Water

Resource Projects” on 22<sup>nd</sup> June 2020. The session was led by Jayakumar P, Senior Principal Scientist and Head, Environmental and Climate Change Studies Division, KSCSTE-CWRDM, Kozhikode. The webinar focused on EIA procedure and the necessity of conducting an EIA process before small and large scale water resources projects. The session had over 800 registrations which comprised 633 students, 376 faculties, 26 employees from the Government sector, 110 Researchers and 49 representatives from the industry and 2k views on YouTube.

### WEBINAR ON “BIODIVERSITY AND CIVIL ENGINEERING”

The webinar on "Bio diversity and Civil Engineering" was a registered event conducted in support of World Environment Day by the United Nation Environment Program (UNEP) on 5<sup>th</sup> of June 2020 in association with the ASCE Student Chapter FISAT. The session was handled by Mr. Jawahar Saud S, Assistant Professor, Department of Civil Engineering, FISAT. The webinar was organized by the department to invoke awareness among students, academia and industry delegates regarding how biodiversity loss and ecosystem damage is caused by Civil engineering projects. There were over 200 registrations and about 350 delegates participated in the webinar using both the Google meet and live streaming through Youtube platform.



### WEBINAR ON PRE-ENGINEERED BUILDING IN SMART CITIES BY MARVEL MAGNUM

A Webinar on "Pre-Engineered Building in Smart Cities" was organised on the 13<sup>th</sup> of July 2020, by Marvel Magnum-MARMAG INFRA PVT LTD (IIT



Madras Incubated Company) in association with ASCE Student Chapter FISAT. The event was presided by Mr. Anoop Baby, Marvel Magnum who addressed the students and introduced the speakers Mr. Rajaprakash, Ms. Prathibha, and Ms. Asha, Structural Engineers at Marmag Infra Pvt Limited. The session consisted of discussions regarding Pre-engineered buildings and conventional steel buildings and the techniques employed for the structural systems. A total of 70 students attended the webinar.

### WEBINAR ON BIM AND BEYOND



A Webinar on "BIM and Beyond" was jointly organised by the ASCE student chapter and CADD international, one of the leading professional education providers in Asia with an exclusive division of CADD, BIM and PPM programs on 20<sup>th</sup> August 2020. The resource person was Mr. Midhun Das. He explained the concept of Building Information Modelling and showed how BIM evolved through years. He also introduced an application, Autodesk REVIT that is used for BIM and the basics of how modelling can be done using the software. The talk was followed by a Q&A session. The session was attended by around 45 students.



## WEBINAR ON “WHICH PATH TO CHOOSE CONSTRUCTION OR DESIGN?”

The webinar on “Which path to choose construction or design?” was organised by the department of civil engineering on 7<sup>th</sup> October 2020 using google meet online platform. Ms. Nalah Williams, Vice Governor/ASCE CI YPC Project Designer/ Core Group was the resource person.



The webinar mainly focused on the choosing path between designing and construction. The speaker provided firsthand experience on both the fields and working experiences and gave detailed knowledge about the pros and the cons about both fields. She spoke about the importance of having a correct timetable and following it and its benefits. The webinar was attended by more than 121 students.

## TECHNICAL TALK ON “EXPLORING MY BACKGROUND AS A CIVIL ENGINEER AND MY EXPERIENCE IN COLLEGE”



ASCE became an active and necessary organization wing in our college throughout the lockdown scenario and effectively became a bridge with experienced and licensed civil engineers. Mr Philip

Pachade was the key speaker of the virtual meet which was held over google meet on October 30<sup>th</sup> 2020. He came out as a special speaker due to two reasons, one he was an Indian origin and American brought up and the second being he was a fresh B tech graduate. This shed light on the importance of internships and evergreen technical experiences u grab from college that Mr. Philip Pachade made use very meticulously. He spoke about his college life and the helpful internships that really streamlined him in the direction of his strength in the field of civil engineering. The meet went well with no glitches and students asked their queries towards the end of the meeting which were all answered. The interaction gave a fresh and much needed perspective into student's minds about how to take the degree ahead with a practical plan.

The alumni webinar on "Introduction to civil engineering profession" by Er. Ananthu krishnan , was conducted on 29 th March 2021 by ASCE student chapter, FISAT. Er. Ananthu Krishnan is a civil engineering graduate from FISAT According to Mr. Ananthu Krishnan, BIM is the future of the construction industry and a knowledge in BIM techniques can assure great opportunities in the field. BIM can ease the construction project management works and his knowledge in BIM gave him the opportunity to work with Emaar. BIM helps us to create a 3D model of the project. The 3D model can be linked with the time and cost data so that it gives the progress of the project at any instance of time. BIM is gradually gaining acceptance by employees and authorities all over india.



## ASCE DAY CELEBRATIONS

ASCE, a tax exempt organisation for professional civil engineers, was founded on Nov 5<sup>th</sup> 1852. 2020 marked the 168<sup>th</sup> year of this professional organisation in existence and the FISAT student chapter celebrated ASCE day through the online platform successfully. The session was presided by

renowned Er.L.S Kannan who had a very strong work experience and knowledge in the field of civil engineering. The meeting began with an opening address by Dr. Unni Kartha G, Head of the Civil Department and also digitally inaugurated the function by playing a video which was made for the celebration and then handed over the virtual stage to the guest of the day.

The talk focused on materials for concrete and gave a very detailed and convincing talk. The meeting was jointly hosted by ASCE student chapters of AMRITA school of Engineering as well as of FISAT. The meeting ended with questions from the participants' side and hence the curtain for 168<sup>th</sup> ASCE day was lowered.

## WEBINAR ON “KERALA FLOODS 2018”

The webinar on”Kerala floods 2018” organised on the 5<sup>th</sup> December 2020 focused on the flood disaster that wrecked total havoc in Kerala during the 21<sup>st</sup> century which broke open



the possible threats we might face again in future. As civil engineers are concerned, responsible and humane ways of development can mitigate havoc effectively. The webinar was presided by Dr. Athira Pavizham, Assistant Professor, IIT Palakkad and the talk focussed on the cause of the flood and also discussed the river stretches before and after the flood. This session gave an insight on the vulnerability of the present human settlements in Kerala state. The webinar was organised by ASCE FISAT student chapter.

## WEBINAR ON “INTRODUCTION TO CIVIL ENGINEERING PROFESSION”





## ADD- ON COURSE CONDUCTED BY THE DEPARTMENT

### HANDS ON TRAINING, BIM WORKSHOP - MODELLING IN REVIT

A seven day hands on training course on “Building Information Modelling - modelling in REVIT” was conducted from 7<sup>th</sup> to 15<sup>th</sup> August 2020, through Google meet platform. The resource persons included Dr. Asha Joseph, Mr Sreerath S and Ms. Gayathri Krishnakumar from the Department of Civil Engineering, FISAT. The workshop covered the major tools used for modelling a building in REVIT Architecture and the materials properties that can be applied. A basic idea of applying topography and rendering was also imparted. The participants were asked to submit a project with the given specifications at the end of the course. The workshop saw registrations of 19 students from various batches including 4 faculty members.



### HANDS ON TRAINING - INTRODUCTION TO LATEX

A four day add-on program on the document preparation software LaTeX was conducted from 7<sup>th</sup> -10<sup>th</sup> July 2020 for the benefit of the B.Tech and M.Tech students. The workshop was held online in google meet and the learning materials were shared on the E-learning platform of FISAT. A total of 45 students and 6 faculty members attended the workshop. The resource person was Dr. Unni Kartha G and was amply supported by Dr. Kavitha PE, Ms. Rajalakshmi TR, Ms. Reshma Prasad, Ms. Rinu J Achison.

### HANDS ON TRAINING - IN Q-GIS

A hands-on training program in Q-GIS was organised by the department on 12<sup>th</sup> December 2020 Mr. Bibin Hezekiel (GIS Analyst) was the resource person for the session. He has completed his B.Tech from Mar Baselios college of engineering and technology in Trivandrum and his masters from NIT Surathkal. The session was mainly about the QGIS software and its functions that allows users to analyse and edit spatial information in addition to composing and exporting geographical maps. After the introduction to the software, Mr. Bibin gave a live demonstration on how to effectively use the software and the similar data were given to the students attending the session so that the students can also actively take part in the process of learning.



## DEPARTMENT ADVISORY COMMITTEE

The Department Advisory Committee was reconstituted with more members from the industry

- Dr. T P Somasundaran, Retd. Professor, NIT Calicut
- Mr. Dinesh C P, Managing Director, FRBS, FACT, Cochin
- Er. Suresh S, Consultant, Associated Structural Consultants, Kochi
- Dr. K S M Panicker, Director (Retd.), FISAT
- Mr. K A Johnson, Parent Member
- Mr. Stefan Jose Panackal, Project Office of Civil, Cochin Shipyard, Alumni member
- Mr. Agi Abraham, Chairman, Builders Association of India, Angamaly Centre
- Dr. George Issac, Principal, FISAT
- Dr. C Sheela, Vice Principal and Dean - Academics, FISAT
- Dr. Sunny Kuriakose, IQAC Coordinator and Dean - Student Affairs
- Dr. Unni Kartha G, Professor and Head, Dept. of CE, FISAT
- Dr. Jiji Antony, Assistant Professor Sr. Grade, Dept. of CE, FISAT
- Dr. Kavitha P E, Associate Professor, Dept. of CE, FISAT
- Ms. Rinu J Achison, Department IQAC member, Dept. of CE, FISAT
- Mr. Nithul T C, Final Year Student



Dr. T P Somasundaran



Er. Suresh S



Mr. C P Dinesh



Dr. KSM Panicker



Mr. Agi Abraham



Mr. K A Johnson



Mr. Stefan Jose Panackal



Mr. Nithul T C

Dr. K S M Panicker, who was formerly the Director (Academics) and a member of the Department Advisory Committee has retired from service during the month of July 2020. He continues to be a guidance and support to all activities of the department giving us timely advice. The department values his suggestions and hopes to receive directions from him in all our future endeavours.



## SOCIALS EVENTS

### COROSTA 2020

2020 shook all sectors irrespective of geography or nature, everyone and everything changed. Even celebrations changed and everything took a tectonic shift towards the online medium where all the events and classes were now being conducted. The year 2020 gave birth to a new way of looking at things and the department of Civil Engineering, was on the same lines. When screen based classes kept breaking spines and tiring eyes, the department called for a breather on a weekend to relish and remember.

The event, the first of a kind within the department, was titled “COROSTA 2020” reminding everyone of fun even in a time struck by pandemic. The festivities spanned over two days and were immensely fun filled and interactive. The main agenda was to overcome the monotonous online class regimes to a more colorful interactive session which did materialize. The online fun event was made into an inter semester competition which added to the spirits of fellow students. There was tight competition between the third and fifth semester students which ended up with third semester students bagging the trophy. There were brilliant displays of art and talent from all the participants which made this event a reality. All the faculty members and students who participated were truly rejuvenated and pumped to face yet another week of online classes.



### ASCE ORIENTATION 2K20

The fresher's began their college life with the online virtual medium. Robbed of fun and physical interaction, the faculty and ASCE members took over the responsibility of blending in with the new batch of students on 24<sup>th</sup> November 2020. Students turned up and the fun began, a platform to introduce and expose everyone was open. Even though everyone missed face to face interactions, they seemed to have adjusted with the new normal. The new batch was introduced into the ASCE activities that would be done annually and provided them a brief overview of their college life ahead if they chose to be a part of ASCE.



### INTRODUCTION OF THE OFFICIAL BLOG OF CIVIL DEPARTMENT

The year 2020 will always be etched in history as a year which taught and gave rise to a lot of events. A new year, a fresh start was the need of the hour for everyone and hence came a ton of promises and resolutions. Our department has breathed new life into the year 2021 by kickstarting a new blog for the department. A social space to share department activities and college related experiences of both the faculty and students. The blog has been well received by the students and teachers with more than over 300 page visits within the first month of the blog being launched.

### POLLUTION ABATEMENT PROJECT

The Department of Civil Engineering successfully completed the project “Pollution Abatement of Puzhakkal River” under the Academic tie up with the Water Resources department, Government of Kerala. This prestigious project was part of the preparation of project reports for the pollution abatement of 21 polluted river stretches

in the state. The project involved site visit, sampling and testing of water samples, mapping of the river stretch and its drains, conducting detailed investigations into the pollution sources and devising methods to manage it. The project was headed by a four member faculty team from the Department, Dr. Unni Kartha G, Ms. Rinu J Achison, Mr. Jawahar Saud and Ms. Abhiya Abbas Mundol. The project was amply supported by Mr. Pauly P K and other staff members from the department. The student team played a crucial role in conducting the detailed survey and sampling. The detailed project report was submitted to the government on 27 February 2021.



### IT'S OKAY- LET'S COMBAT

ASCE, student chapters, FISAT had launched a mental health campaign by mid-2020 and the related activities were pouring in various forms. “LET'S COMBAT” was a video conceptualized that was created by the third semester students which was later uploaded in YouTube. The video spoke about the methods by which one could overcome the barricade of mental health issues. The motivational video was launched on 14<sup>th</sup> November 2020 and had a very positive and overwhelming response from the department and from the general audience.





## FACULTY ACHIEVEMENTS

### CONGRATULATIONS TO THE PHD AWARDEES

Perseverance is that one key that has landed you in such a remarkable position of attaining your PhD degree. A doctoral degree is by no means an easy feat. Years of hard work, exhaustion, self-doubt and tenacity culminate in the PhD. The faculty and students are extremely proud of our doctorate awardees who have accomplished this task with their hard work. Best wishes for this important milestone in your life and career and may there be many more to come.

#### Dr. Asha Joseph

She completed her PhD on the thesis topic "Behaviour of ground supported cylindrical water tanks subjected to seismic loading" from School of Engineering (CUSAT)



#### Dr. Unni Kartha G.

He completed his PhD on the thesis topic "Liquefaction studies on sand and its mitigation using stone columns" from School of Engineering (CUSAT)



#### Dr. Jiji Antony

She completed her PhD on the thesis topic "Investigation of clay tile waste as partial replacement of cement in masonry mortar and building blocks" from School of Engineering (CUSAT)



### DR. JIJIANOTHONY AWARDED THE ICI- ULTRATECH AWARDS

Dr. Jiji Antony, Senior grade, Assistant Professor, Department of the Civil Engineering, FISAT won the Indian Concrete Institute- Ultratech Awards in the category of 'Best Doctoral Thesis entitled "Investigation of Clay Tile Waste as Partial Replacement of Cement in Masonry Mortar and Building Blocks"'. The prestigious award function was held in Kochi on 25<sup>th</sup> march 2021. Dr. Jiji Antony has a rich teaching experience and was awarded and honoured by different organizations and colleges over the years. Her exemplary work was yet again acknowledged and the former FISAT best teacher awardee has many more star studded years yet to come in her illustrious career of teaching.



## STUDENT ACHIEVEMENTS 2020

### GATE RESULT 2021

This year 7 students from the department successfully cleared GATE 2021 out of which 3 secured a rank in the top AIR 5000. Kudos to the students and best wishes for their future.



VISNUDATHA V  
RANK - 1905



SOWMYA ZAVIER  
RANK - 2194



RIA MARIAM SABU  
RANK - 4327



ADHUNA JOHN  
RANK - 10275



ANITHA JOSE  
RANK - 11930



ARYA SM  
RANK - 12385



DEEPAK C R  
RANK - 18629





## AVISHKAR 2020

Aavishkar 2020, the exhibition of the projects undertaken by final year students of the department was conducted online on 17 June 2020 by the ASCE student chapter of FISAT in association with ICI Kochi Chapter. An official website was launched showcasing the work done by the students in the form of short videos. The videos were viewed and rated by the faculty, ICI members and the general public. The projects presented were widely appreciated regarding the topics taken and work done.

(<https://sites.google.com/fisat.ac.in/aavishkaar/home>)

The virtual exhibition was inaugurated by Ms. Anitha P, Chairman, Governing Body, FISAT and attended by the Principal, Vice Principal, Deans and Heads of various departments apart from the students and faculty.

Various awards were given to the project teams based on their work and the rating obtained. The awards are as given below:

### BEST PROJECT

'Mapping Methane Emissions From Paddy Fields Using Geospatial Techniques' by Ajin Jacob, Anumol Suni, Aparna V R and Elvin Roy guided by Ms. Abhiya Abbas Mundol



### BEST INNOVATIVE PROJECT

'Soil Piping Detection Using Remote Sensing' by Manjima Sunil, M J Anumod, Presty Rappai and Saranya P Vinod guided by Ms. Panjami K



### BEST PROJECT WITH SOCIAL RELEVANCE

Risk Communication For Long Term Health Risks Due To Particulate Matter At Industrial Areas Near Ernakulam' by Abhaya Davis, Eby Joison, Fathima Nazrin and Jason Sabu V guided by Mr. Jawahar Saud S.



### BEST VIDEO PRESENTATION

'Geometric Design Of Junctions And Simulation Using Anylogic Software In Irinjalakuda' by Anagha R Nath, Anitha Jose, Arya S M and Avanthika B guided by Ms. Leena Samuel Panackel.



### BEST PROJECT WITH INDUSTRIAL RELEVANCE

'Design Of A Phosphate Removal Technique From Industrial WasteWater Using Chemical Coagulants And Natural Adsorbents' by M A Harikrishnan, Raihana T Sakkeer, Shabana Nizar and Wafa Abdul Rasheed guided by Mr. Jawahar Saud S.



## FUNDED PROJECTS

The Department received funding from KSCSTE for the following projects:

- ♦ "Experimental Investigation on Hydrophobic Concrete" with Dr. Jiji Antony ( Assistant Professor, Senior Grade) as Principal Investigator and Ahallya Raveendran as Co-investigator
- ♦ "Assessment of Governance Gaps in Landslide Risk Reduction- A case study from Kattippara,Kozhikode District-" with Mr.Jawahar Saud S. (Assistant Professor, Special Grade) as Principal Investigator and Ms.Sreereekha.K as Co-Investigator

The funded projects were conducted in a timely manner and the findings were presented in the International Conference on Structural Engineering and Construction Management (SECON2020) and is published in the Lecture Notes in Civil Engineering (LNCE),ISSN:2366-2557,ISBN:978-3-030-55114-8, a Scopus Indexed publication by Springer



**Dr. Jiji Antony**



**Mr. Jawahar Saud S**



**Ms. Ahallya Raveendran**  
S4 SECM (2018-2020)



**Ms. Sreereekha. K**  
S4 SECM (2018-2020)



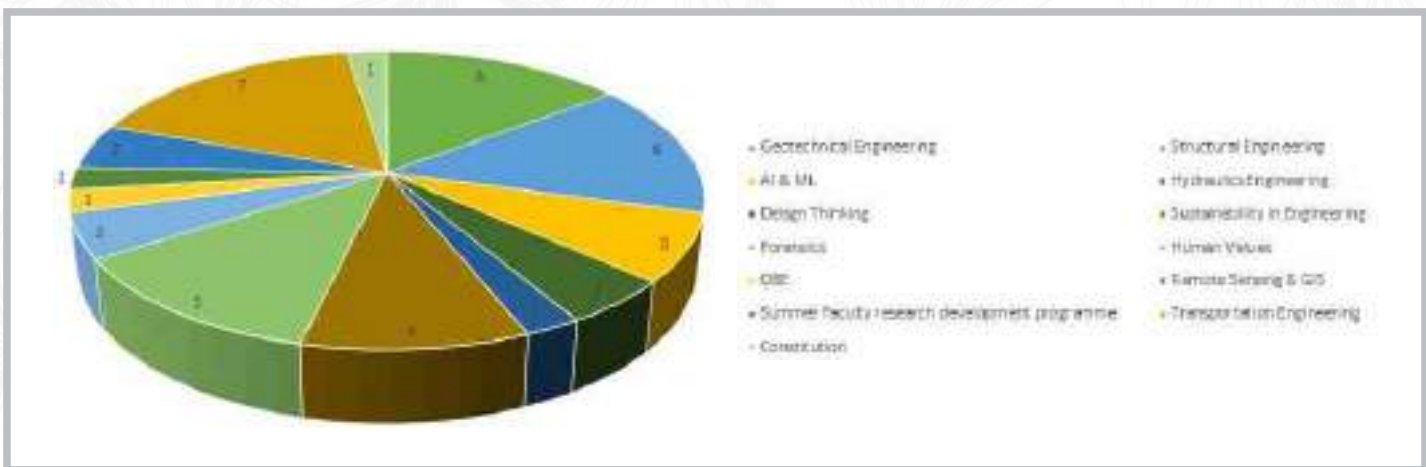
## IIRS OUTREACH PROGRAMME

FISAT is an approved remote centre for conducting the online courses offered jointly by IIRS-ISRO in the domain of GIS and Satellite related technologies. The department encourages students to undertake the courses offered. Faculty members also engage with these students and mentor them in these online certification programs. The courses such as IIRS Outreach Programme on RS Applications in Agricultural Water Management, August 3rd -7th 2020, IIRS Outreach

on Geospatial Inputs for Enabling Master Plan Formulation, July 27th-31st 2020, IIRS Outreach Programme on Application of Geoinformatics in Ecological Studies, July 13th-24th 2020 and IIRS Outreach Programme on Basics of Remote Sensing Geographical Information System and Global Navigation Satellite System, August 19th-November 15th 2019 were successfully completed by the students during the present academic year.



## FDP/WORKSHOPS ATTENDED BY THE CIVIL ENGINEERING FACULTY

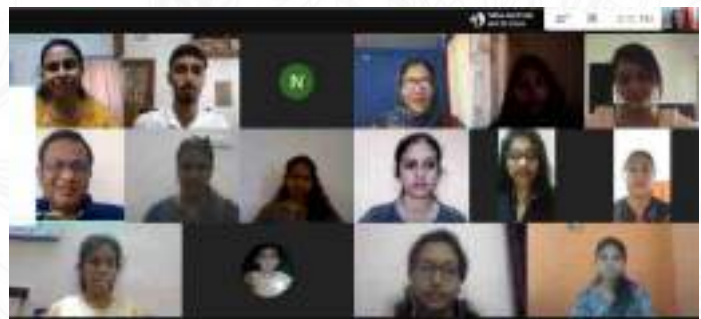


## FAREWELL TO PASS-OUT BATCHES

*“Every new beginning comes from some other beginning's end.”*

Saying goodbyes were never easy, but even amidst this covid pandemic we couldn't bid farewell to our dear students without passing on our blessings and well wishes. The outgoing batch of 2020 will be remembered for a long time, a batch good in academics, a batch that brought out considerable contributions to the department and college and also a batch that had to spend the memorable last days of college in their homes staring into the screen hoping for a better tomorrow. For the first time in college history the college farewell was being held virtually.

On the August 29<sup>th</sup> 2020, the virtual farewell was organised for the MTech (2018-2020) and BTech (2016-2020) students under the name Laa Gòn and 'Adieu 2K20' respectively. At the farewell function for the BTech students, the Head of the Department Dr. Unni Kartha G, handed over the best project awards of Aavishkar'20. The event concluded by a vote of thanks proposed by Dr. Unni Kartha G, Head of Civil Engineering Department.





## DESIGNO-2021

The Department of Electrical and Electronics Engg, FISAT organised DESIGNO-2021 an online Design project expo for 2018 admission batch in the month of February 2021 which was marked to be very encouraging and interesting by our students. Link Disigno <https://sites.google.com/view/designo-2k21>



## HANDS-ON WORKSHOP ON MAGNETIC CIRCUIT DESIGN OF POWER ELECTRONIC CONVERTERS.

A one day workshop on magnetic circuit design of power electronic converters on April 7<sup>th</sup> 2021 at research lab of the Department. It aimed to provide a intense training on magnetic circuit design for M.Tech S4 PEPS students. Ms. Jyothi G K, Asst. Professor of the Department was the resource person of this event. This workshop mainly dealt with provides the inductor design for power electronic applications. It describes both theory and practice of inductors used in electric circuits. The speaker presented a broad range of applications from modern power conversion systems and provided precise guidelines for inductor design. She explained about real design examples and demonstrate how to wind an inductor. The students who participated in the workshop could design and wind inductor under the guidance of the resource person.



## ILLUMINAR 2020

Department of Electrical and Electronics Engg, FISAT organised Illuminar 2020 an online project expo for 2016 admission batch in the month of June 2020 which was marked to be very encouraging and interesting by our students.



## POWER QUIZ

The POWER QUIZ is being conducted among the students with the aim to spread awareness about the Energy sector by KSEB Officers Association every year. The Power Quiz - 2020 was conducted through online media- "Google form" on November 8<sup>th</sup> 2020 Sunday at 2pm. The registration of the participants was only through online. A trial quiz was also scheduled on November 1<sup>st</sup> 2020 at 2 pm.



## TRAINING PROGRAM ON "TRANSMISSION SCADA"

The Department of Electrical and Electronics Engineering, FISAT, organised ten day Industry Oriented Online Training Program on "TRANSMISSION SCADA", during July 23<sup>rd</sup> 2020 -August 12<sup>th</sup> 2020. The resource person was MUHAMMED NADEER T. M, Assistant Engineer KSEB, 220KV substation, Brahmapuram.

The ten day sessions included detailed view on various topics, such as Remote Terminal Unit, Configuration of MFTs and RTUs, Substation Automation System, Communication System, Data Concentrator cum Protocol Converter, SCADA Network, Major Server Applications, Energy Management System Functions in a SCADA architecture. The program was well appreciated and marked to be encouraging by active participation of Engineering faculty and students from other colleges too.





## ALUMNI SPEAKS

### Sreenath Chalil Madathil,

PhD (Batch : EEE, 2002-06), Assistant Professor, Industrial, Manufacturing & Systems Engineering (IMSE) Engineering Building A-243, The University of Texas at El Paso, 500 W. University Ave.

“Outstanding and dedicated faculty, well-equipped laboratories and library, and environment to learn and collaborate is the hallmark of FISAT’s Electrical and Electronics Engineering Department. Personally, as an aspiring engineer, I had great academic experience at FISAT with exceptional mentorship and timely advice to advance my career. I developed the solid knowledge and toolset at the EEE department to be a successful engineer that includes good analytical skills, good problem solving and programming skills, interpersonal and communication skills, and other relevant industry-ready toolsets. Moreover, FISAT is a stunning campus with an excellent academic atmosphere.”



### Naveen R

(Batch : EEE, 2012-16), Senior Software Engineer, Vehicle Safety Division, Robert Bosch India

My experience under the excellent tutelage of the staff in FISAT EEE department played a definitive role in my career. Bringing the industry standard to the classroom with Industry connect sessions, helping students undertake academically and socially relevant projects, inculcating critical and logical thinking skills along with regular education are some of the highlights. My work on Regenerative braking functions at Bosch is made possible because of the foundational knowledge laid down at FISAT. With the ongoing push to Electric Mobility, I trust the FISAT EEE Dept to aid and lead innovations in this field and continue to act as a bridge between industry and academia for aspiring engineers.



### Mohammed Safer M.A.

(Batch : EEE, 2008 -12), Assistant Manager (Electrical), CIAL Infrastructures Ltd.

I am a 2012 Alumni of FISAT (B. Tech. EEE). FISAT is one of the best Engineering colleges in Kerala and Electrical department is one of the finest departments. The faculty of my department were very supportive in developing our technical and non technical skills. I am extremely thankful to the Electrical Department and entire faculty team for giving us extra support and assistance in cracking the competitive GATE examination. I got my first job through GATE 2012 and got recruited in Damodar Valley Corporation, the first multipurpose river valley project of India. Now I am working as Assistant Manager, Electrical at CIAL Infrastructures Ltd., a wholly owned subsidiary of Cochin International Airport. My current portfolio is the execution and maintenance of Renewable Energy (Solar and Hydel) projects for the Airport.



### Prince Peter Pulikkottil

(Batch : EEE, 2002 - 2006), Operation engineer, Distribution field operation, Distribution Power (Deira zone) Dubai electricity and water authority (DEWA)

“I am extremely proud to be a FISATIAN and really grateful for the impeccable learning opportunity provided by both the Department of EEE and college authorities. The foundation stone of my career in the power sector have been laid by the insightful faculty. I am really thankful to all my teachers and staff for the success in my career”



### Basil Alias

(Batch : EEE, 2016 - 2020), Assistant System Engineer - Trainee, Tata Consultancy Services, Kochi

It gives me immense pleasure to say that I'm a FISATian. Being a student of engineering is a challenge in itself. It's difficult to sum up the memories and experiences of four years in few lines. However, for me B. Tech. was all about the cherishable memories of the past and great hope of the future. I strongly believe that there exists moral support along with determination to achieve anything in our life. I am extremely grateful to all the faculty and amigos of the Department of Electrical and Electronics for being so supportive and bringing out the best in me. An open mind is the ideal one for graduation. Being introduced to new ideas, philosophies and better ways of looking at our life should be the major point rather than just indulging in the high pressure of semester modules. Moreover, in between the naive fresher year and refined final year, life happened.





## REPORT ON ELECTRA DAY-FIESTA DE VOLTA

**“Art enables us to find ourselves and lose ourselves at the sameTime.”**

Electrical and Electronics Students Association (ELECTRA), FISAT organised an online arts event FIESTA DE VOLTA as a part of Electra Day on 14 November of 2020. The event was organised to exhibit the talents of students. The event also gave students a small ease off from their studies and also provided an opportunity to actively participate in various events. On 27 October 2020.

Dr. Parvathy R. officially unveiled the event by releasing the promo video of FIESTA DE VOLTA in a virtual meeting platform. The opening ceremony was accompanied with full coordination among students. The posters of individual events were released during the ceremony.

FIESTA DE VOLTA consisted of six individual events. Each of the event had individual coordinators to formulate rules and to coordinate the whole event. The events were promoted by adopting various social media platforms. The event entries were collected by each event coordinator. Entries were evaluated based on specific rules formulated by specific event judges.

Results were announced on 21<sup>st</sup> November 2020 at the closing ceremony of FIESTA DE VOLTA. It was conducted on a virtual meeting platform. Digital Certificates were distributed to all the participants and winners of the events. The event ensured and encouraged active participation of students. FIESTA DE VOLTA turned out a grand success and gave students the opportunity to participate in events and showcase their talents by adopting virtual platforms.



## WEBINAR ON POWER SYSTEM CHALLENGES AND ROLE OF SMART GRIDS

The Department of Electrical and Electronics Engg, FISAT organised an A webinar on POWER SYSTEM CHALLENGES AND ROLE OF SMART GRIDS with an objective to generate research interest in power systems on 31<sup>st</sup> OCTOBER 2020.

The resource person was MsNeethu George, Research Scientist at Hitachi ABB Power Grid, Bangalore who has more than 10 patents filed in various research sub-areas of power systems. This technical session was well appreciated one by many faculty and students.



## PECON-2021 International Power and Energy Conference

The Department of Electrical and Electronics Engg, FISAT joined with IEEE PES Kerala Chapter, the Energy Management Centre, Govt of Kerala and the Institution of Engineers (India), Kochi Local Centre. organised, PECon-2021, international conference on "Smart Technologies for Power and Renewable Energy" on February 1-3, 2021 with the objective to create a platform where experts from academia and industry share the recent developments in this area by which researchers, students and faculty get benefitted and combined keynote lectures, paper presentations and virtual poster presentations.

The scope of the conference was Smart Grid, Microgrid, Power Grid Integration, Advanced Metering Infrastructure (AMI), Transactive Energy, Impact of Electric Vehicles in Grid, Evaluation of power systems that are affected by Sustainable Energy, Application of GIS in distribution system, Transmission Monitoring, Power Electronic Application in Renewable Energy Integration, Demand Side Management and Energy Policy, Control Strategy in Power System, Transmission Operations and Security, Dynamic Security Assessment.







Phd Awarded on December 3rd, 2020  
 (cochin University of Science And Technology )

Title: **“REALIZATION OF OPTIMIZED OBSERVERS FOR SPEED AND POSITION ESTIMATION IN SENSORLESS BLDC MOTORS”**

**DESIGN AND DEVELOPMENT OF A LOW COST HOME AUTOMATION SWITCH**

*Final Year Project*  
 Received Financial Assistance to Student Project under APJAKTU CERD Scheme



**INSTITUTIONAL WORKSHOP ON SWACHHTA ON APRIL 29<sup>TH</sup> 2021**

Mahatma Gandhi National Council of Rural Education (MGNCRE), Department of Higher Education, Ministry of Education, Government of India in association with IEDC FISAT, Nature club of FISAT- SWAN and NSS FISAT, IEDC FISAT organized an online Institutional Workshop on SWACHHTA on April 29<sup>th</sup> 2021 from 2pm to 3.30pm.

The workshop started with the welcome address by Dr. Prasad J.C., Head of Department of CSE. The programme was presided by Dr. George Issac, principal FISAT. Dr. Jiji Antony, Assistant Professor (Senior Grade) briefed on the SESREC cell activities and future plans under the guideship of NSS, IEDC AND SWAN, FISAT.

Our eminent expert for the day was Dr. Dipu Varghese from MGNCRE. Need for students being in blend with nature was highlighted.

Dr. Dipu Varghese, Head of the Department - Management and NAAC Coordinator at MET's College of Advanced Studies. He emphasized on the fact that hygiene and hygienic practices in life are critical for health not only to improve a living environment but also to elevate our thinking to a more pure and healthy state.

**ALUMNI WEBINAR SERIES**

The Department of Electrical and Electronics Engg , FISAT organised an ALUMNI webinar series on different themes with the objective to create student awareness around the various positions held by our ALUMNI, and their personal experiences in FISAT , along with their motivational guidelines towards the positions they held at present, during JUNE - AUGUST 2020, which was marked to be very encouraging and motivating sessions by our students. The resource persons for the webinar were OUR PROUD ALUMNI who are top officials in many renowned Organizations including an IPS officer.





## ASTERISM – DIGITAL WELLBEING

IEEE Computer Society of IEEE FISAT SB conducted a webinar on the topic Digital wellbeing on July 29<sup>th</sup> 2020 with an audience count of over 90 persons. The session was conducted as a series by Mr. Anil Rachamalla, founder of End Now foundation handled the session.



## KURERO

The Student Development Program of IEEE FISAT SB conducted an online panel discussion on the topic, “How to select and implement a project topic” on September 7<sup>th</sup> 2020. Our aim was to provide ideas and awareness on choosing a project topic and to clear all the doubts regarding its implementation.



## PREXTREME 2.0

IEEE FISAT SB organized a 24-hour PreXtreme 2.0 with over a count of 80+ participants in and around student branches on September 27<sup>th</sup> 2020. A two-week online boot camp was arranged from September 9<sup>th</sup> - 24<sup>th</sup> 2020. By organising PreXtreme, we intended to provide a competitive experience, logical reasoning skill development, programming skill development and a preparation stage for the SB members to participate actively in IEEE Xtreme 14.0.

Challenges were provided on a day to day basis to the participants during the boot camp. Two coding challenges were given per day. The difficulty level of questions was set to easy, medium, and hard as like the IEEE Xtreme. The participants were able to interact with the student mentors to clear the doubts in the challenges. 24 hours was provided for the participants to submit their code in the Hacker rank platform during the online boot camp. Individual, as well as team-wise participation, were made so that students were able to help with each other. Winners of PreXtreme 2.0 were selected on the basis on the accuracy of their codes and time taken to complete each challenge.

Winners of PreXtreme 2.0

1st position - Manu Krishnan NS (Rajagiri School of Engineering and Technology)

2nd position - Awin Chris Joy (Sahrdaya College of Engineering and Technology)

3rd position - Anjali Dileepkumar, Anjana Dileepkumar, Adharsh M (NSSCE, Palakkad)

## PYCODE 2.0

IEEE FISAT SB conducted PyCode 2.0, a 3 day online Python Class which started on December 23<sup>rd</sup> 2020 from 7:30-9:00 PM and was exclusively for the first year student members of IEEE FISAT SB. The session was handled by Ms. Devika S, 4<sup>th</sup> year ECE, FISAT. The event was conducted for the students of different branches to give the students a basic idea of programming from its fundamentals. Hands-on training was provided to the students in order to provide them with a professional commitment. The classes were focused on the basics of python programming, and the right way to approach a given problem statement.



The participants got new insight about programming and Python language. They found the topic very interesting after attending the session. In short, students gained a better knowledge about coding, which would help the participants in making their innovative ideas into reality by solving different problem statements.

## ASTERISM – “MOVE” WITH PURPOSE

IEEE Women in Engineering Society of IEEE FISAT SB conducted a webinar “Move' with a Purpose” on September 11<sup>th</sup> 2020 at 7 PM. The session was handled by Ms. Mary Ellen Randall.



## SPACE WEEK 2020

As a mission to provide knowledge on Space Science, IEEE FISAT SB organized Space Week 2020, during which much knowledge regarding space science was shared with the students. Videos related to Space scientists and astronauts were released through the social media of IEEE FISAT SB during the space week which gave the students more knowledge about space researchers and astronauts. By conducting Space Week, the students were able to gain more knowledge about planets, satellites, stars, asteroids, meteoroids, astronauts, etc.

The following events were conducted during Space Week 2020:

1. STARGAZE - Online Photography Contest
2. Cryptex 2.0 - Online Treasure Hunt





## COGNIZANCE 10.0

Cognizance 10.0 was conducted by IEEE FISAT SB exclusively for second years. The event began on November 7<sup>th</sup> 2020 and lasted till December 12<sup>th</sup> 2020. Both technical and non-technical events were arranged in association with Cognizance 10.0. It was both arranged as well as participated by second year students.

**DesignX :**DesignX was a webinar on Photoshop. This session was handled by Aswin Sreeraj of S4 ECE. The webinar lasted for an hour and a half.

**Cliptomania :** Cliptomania was a workshop with hands-on experience taken by Ashwin Sreeraj of S4 ECE. This session taught how to edit a video and at last a hackathon.

**Oracular :**Oracular was an exhibition that showcased the projects done by students of the Student Development Project (SDP) in 2019-2020. It also familiarised SDP among students.

**Fizzle :**Fizzle was a quiz related to FISAT. Questions were given in password-protected pdf format, except for the first question. The key for the second pdf was the answer to the first. The team who completed it first was announced as winners.

**YouTube Hunt :**YouTube Hunt was a fun activity that included clues spread out throughout the tech channels. Clues and hints were provided from which a team of a maximum of four members can unravel the mystery to complete the hunt.

**Arduinaut :**Arduinaut was a webinar session on Arduino which was handled by Govind S Warriar of S4 EEE. The webinar covered all the topics including what, how, where, and when can we use Arduino as well as some basic projects that can be done using Arduino.

**Stellaroid :** Stellaroid was a webinar session handled by Ashwin Murali from S4 ECE. It created awareness about our civilization and culture. This seminar focused on the scientific scenario of the present situation and also approaches to the same.



## FREE HIT

IEEE Computer Society FISAT Student Chapter as part of All Kerala Computer Society Student Congress (AKCSSC) 2020 organized Free Hit, an online coding competition on November 14<sup>th</sup> 2020 from 8:00 PM – 9:00 PM.



## TECH INCEPTION

IEEE RAS FISAT Student Chapter conducted Tech Inception, which was handled by Mr. Sebin Thankachan, System Design Engineer, Atoll Solutions on January 10<sup>th</sup> 2021. It was a one hour crisp talk started from 7:00 PM. Through his session he articulated the various placement-oriented skills, technical knowledge, and many other important skills that the students should have to study and master along with their academics.



## C WORKSHOP

IEEE Computer Society FISAT Student Chapter conducted a three day online C programming workshop exclusively for first year students of IEEE FISAT SB, which was handled by Mr. Mohammed Hashim, 4<sup>th</sup> year CSE and Ms. Sona Grace John, 4<sup>th</sup> year CSE. The workshop began on January 13<sup>th</sup> and lasted till January 15<sup>th</sup> from 7:00 to 8:00 PM. Topics such as Arrays, Function, Pointers and Structures were covered in this workshop and this session was taken as a prerequisite for the Tinker cad workshop as C programming a core part of Arduino programming.

## LETS TINKER

IEEE RAS FISAT Student Chapter organized Lets Tinker, an online workshop exclusively for first year students of IEEE FISAT SB to enrich the Arduino programming skills. This event was handled by Mr. Jose Ben, 2nd year ECE and Mr. Govind S Warriar, 2nd year EEE. The workshop began on February 8th and lasted till February 13th from 5:00 to 6:30 PM. Task such as to setup an alarm system using Arduino in the Tinker cad platform were given to make the concept clear.



## METADZ

IEEE RAS SBC ASIET In collaboration with IEEE RAS SBC NSSCE and IEEE RAS SBC FISAT, organized metadz, a 3-D modelling competition with mentoring. The session was handled by Mr. Anuroop KB on 2<sup>nd</sup> December 2020.



## CHANNELIZING YOUTH POWER TO BUILD THE NATION

IEEE FISAT SB in association with ECHO organized Channelizing Youth Power to Build the Nation which was handled by Mr. Anand Jagadeesh, Secretary, IEEE Bangalore Chapter on 12<sup>th</sup> January 2021 from 7:30 PM to 8:00 PM. It was an interactive section which includes how to uphold the career during college life. Basically, it was a Q&A session with high interaction from participant's part.





## BIVOU 21'

BIVOU 21' was conducted by PES, CS, WIE & RAS Student Chapters of IEEE FISAT SB, which was open to all student branches, under which three events we conducted from 16<sup>th</sup> -29<sup>th</sup> February 2021 i.e.,

1. NOVA with 93 registrations was a 48 hour Arduino hack on Tinker CAD Platform which began on February 16th midnight. First prize (Raspberry Pi Pico Microcontroller) was awarded to Susmith Das K K of TKMCE.
2. ECTA with 112 registrations was an interactive one hour talk session based on career guidance by Mr. Anoop Sreenivasan, direct Product Management, Chegg Inc. and Mrs. Brinda Lovely, Head of Engineering Operations, Google and it ended with a Q&A session with a heap of fundamental enquiries from participants.
3. QUEST with 59 team registrations was an 24 hour hunt filled with both technical and non-technical questions. Its started on February 28<sup>th</sup> midnight. First prize was awarded to Team ROBINHOOD 2.0, Soorej S and Pranav K P of College of Engineering, Adoor with gift as one month prime subscription.



## ACHIEVEMENTS

IEEE FISAT SB was selected as the student Branch partner of IEE Region 10 SYWL Congress 2020



Nandini K Sanilkumar secured second prize in Shoot Your Artefact conducted on July 15<sup>th</sup>



In Pycode 2.0 conducted on December 20<sup>th</sup> 2020 Vysakh Madhu secured first prize. Navaneeth M Nambiar secured second prize. Samunai secured third prize.



Ardra Saji holds the position as the publicity manager of IEEE PIE Kerala Section.



Rosmi Johnson S3 CS won the doodle contest by IEEE WIE.



Congratulations George Puthanagadi, S7 CSE student, who was selected as the outstanding student volunteer in IEEE Kochi Subsection Awards 2020.



Prebiton Paul S7 CSE Student, achieved the first prize for FREE HIT conducted as part of AKSSC-2020 on November 15<sup>th</sup> 2020.



Eby Kurian CS S1 was selected to the content team in Kerala Section Interns.



Anagha Jayaraj achieved Third prize in REC-MO conducted by IEEE SB JEPPIAAR engineering college.



Ms Devika S R ECE S7 secured GHCI 2020 Scholarship on July 26th 2020



Jose Ben was selected as the Technical Coordinator for the student Leadership Team 2021 of IEEE RAS Kerala Chapter.



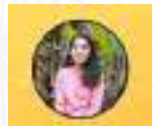
Rosmi Johnson S3 CS was selected to the Design Team of IEEE WIE Kerala Chapter.



R Sreyas and Aswin Sreeraj are selected to the Design Team of IEEE Computer Society Kerala Chapter 2021.



Anagha Jayaraj, S5 CSE student secured first prize in Mindebend.



Mohammed Nihal, S3 CSE Student and Rishad P S7 CSE Student created an online placement portal for ASAP Kerala.



Arjun Krishna JG S5 CS secured first prize and Anagha Jayaraj S5 CS secured second prize in Video autopsy competition conducted by IEEE JIT SB, Madras Section.



Philvin Eldho and Rahul S are selected as the IEEE PES day 2021 ambassadors.





## FACULTY ACHIEVEMENTS



Mr. Arun S, Assistant Professor of Physical Education (Senior Grade), was awarded PhD Degree by Tamil Nadu Physical Education & Sports University for his research on "Technical and tactical optimization factors in High performance Judo - A critical performance evaluation of Indian male and female Judokas in National competitions" in October 2020.

Ms. Seena Varghese, Assistant Professor of Mathematics, published an article "COVID 19 - A Good Teacher and a Good Preacher" in the book "Share an Experience - Lessons from COVID 19 Pandemic" by ELTAI, Tirupathi Chapter.



Dr. Sona Narayanan, Assistant Professor of Chemistry, presented papers at 4 major international conferences across the country and received the Best Paper Award in the National conference on Changing Trends in Polymer Science and Technology held at NIT Calicut.

Dr. Binimol Punnoose, Associate Professor of Mathematics, was a resource person during the seven day FDP on Essential Mathematics for Engineers and Researchers, conducted by the Department of General Science & Engineering, SKN Sinhgad College of Engineering, Pandharpur, Maharashtra.



She was also the resource person for the webinar conducted in association with National Mathematics Day at the National High School, Vallamkulam, Thiruvalla on December 22<sup>nd</sup> 2020.



Dr. Ayswarya E P, Assistant Professor of Chemistry, published and presented papers at two International Conference as well as in International Journal of Advanced materials and Applications.

Mr. Sumesh G, Assistant Professor of Mathematics, was the resource person for a webinar on Laplace Transforms, conducted by St. Xavier's College, Aluva on February 23<sup>rd</sup> and 25<sup>th</sup> 2021.



## NPTEL ACHIEVEMENTS

- ♦ Ms. Nyci Ignatius, Assistant Professor of Economics, completed an NPTEL course on "Economic Growth and Development".
- ♦ Dr. Ayswarya EP, Assistant Professor of Chemistry, completed 4 MOOC Courses with Elite Certificates via Coursera/NPTEL
- ♦ Ms. Anisha Joseph, Assistant Professor of Physics, completed 4 MOOC Courses with Elite+Gold Certificates via Coursera/NPTEL
- ♦ Ms. Dhanya TG, Assistant Professor of Mathematics, completed an NPTEL course on "Stress Management" with Elite+Silver Certificate.
- ♦ Ms. Aswathy Balagopal, Language Lab Demonstrator, completed an NPTEL course on 'Postcolonial Literature' and secured Elite+ Gold Certificate.
- ♦ Dr. Sona Narayanan, Assistant Professor of Chemistry, completed an NPTEL course on Basics in Inorganic Chemistry with Elite Gold Certificate. (Top topper 2%).
- ♦ Mr. Eldhose P Jacob, Assistant Professor of Chemistry, completed an NPTEL course on Basics in Inorganic Chemistry with Elite Certificate.

## INTERNATIONAL WEBINAR

The Department of Science and Humanities, FISAT organized a two-day International webinar on "Emerging Trends in the Field of Science & Humanities" on 16<sup>th</sup> and 17<sup>th</sup> of October 2020.

Dr. K S Nizar (Professor, Department of Mathematics, Prince Sattam bin Abdulaziz University, Kingdom of Saudi Arabia), Dr. Bhamini Nayer (Professor of Mathematics, Morgan State University, United States of America), Dr. Rangarajan Gopalakrishnan (Professor, Rajagiri Business School Kakkanad), Dr. Aby C (Scientific Researcher, Palacky University, Czech Republic) and Dr. VINU T P (Assistant Professor, Dept. of Physics, NSS Hindu College, Changanacherry) were the resource persons.



Rolling Stone, the college literary association, Department of Science and Humanities in association with the British Council, conducted a webinar to create awareness among students with regard to IELTS preparation and related topics on November 7<sup>th</sup>, 2020.



Maths Club FISAT, Department of Science and Humanities, FISAT organized a lecture "Ramanujan Smriti" on 22<sup>nd</sup> December, 2020 to celebrate National Mathematics Day. Mr. Renjith Prasad (MTech in Computer Science, IIT Jammu), who is an alumnus of FISAT was the resource person.



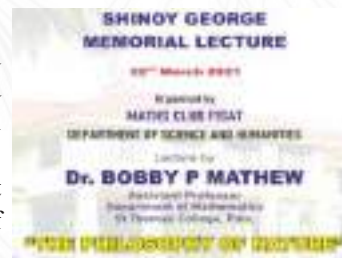
Maths Club FISAT, Department of Science and Humanities, FISAT organized an Inter- Departmental Mathematics Quiz competition for the PV Mathew Memorial Trophy on February 26<sup>th</sup>, 2021.

Winners

- 1) Ryan Abraham(S7 EEE)
- 2) SheminMajeed(S5 CE B)
- 3) Dreama Paul (S1 CSE A)



Maths Club FISAT, Department of Science and Humanities, FISAT organized Shinoy George Memorial Lecture on 22<sup>nd</sup> March, 2021. Dr. Bobby P Mathew (Assistant Professor, Department of Mathematics, St. Thomas College, Pala) was the resource person and the topic was “The Philosophy of Nature”.



The Department of Science and Humanities, FISAT organised a National webinar on "Intellectual Property Rights" on 25<sup>th</sup> April, 2021. Dr. Narendran T - Technical Officer, IPR, National Biodiversity Authority, India, was the resource person.



## STUDENT ACHIEVEMENTS

Ms. Namitha Krishnankumar (ME 2017-21) and Ms. Krishnapriya S (CSE 2018-22) was awarded the Shinoy George Memorial Award for the highest score in Mathematics



Shemin Majeed, Jerom Wins, Vinaya Happy, Vandana Sanil, Adhil Muhammed K, Joseph Paul, Bivin C Benny (S3 CSE A), Abhijith R K, Manish Pillai, Akash Krishna K (S3 CSE A), Emmanuel Jojoy (S3 CSE A), Emmanuel Jojoy (S3 CSE A) & Jiss Jose (S3 CSE A) participated in the online quiz competition conducted by St. Aloysius' College (Autonomous), Jabalpur, Madhya Pradesh and emerged winners.

Shemin Majeed, Manish Pillai, Mariya George, Keerthi P M, Abhijith R K, & Unnimaya participated in the online quiz competition conducted by The Bapatla College of Arts & Science and emerged winners.

Mr. Aman Jose (CSE 2020-24), received the following prizes in Mathematics Quiz Competitions

- i) First prize in the All Kerala Inter-collegiate Mathematics Quiz Competition conducted by KE College, Mannanam.
- ii) Second prize in the All Kerala Inter-collegiate Mathematics Quiz Competition conducted by Baselius College, Kottayam.
- iii) Third prize in the All Kerala Inter-collegiate Mathematics Quiz Competition conducted by SB College, Changanacherry.



Emmanuel Jojoy (S3 CSE A) won the second prize in the “ARYABHATTA”, the 3<sup>rd</sup> National Online Quiz Competition on Mathematics.



Sandra Mariya, Jiss Jose (S3 CSE A), Santhwana T, Aswin M.S, Aneeka Geo, Mariya George, Ajunraj PP (S3ME), Abin Joseph (S3 EI), Sana T A (S3 CSE B), Basil Eldho (S3 ME A) & R SREYAS (S3 CSE B) participated in the online quiz competition conducted by Voorhees College, Vellore and emerged winners.



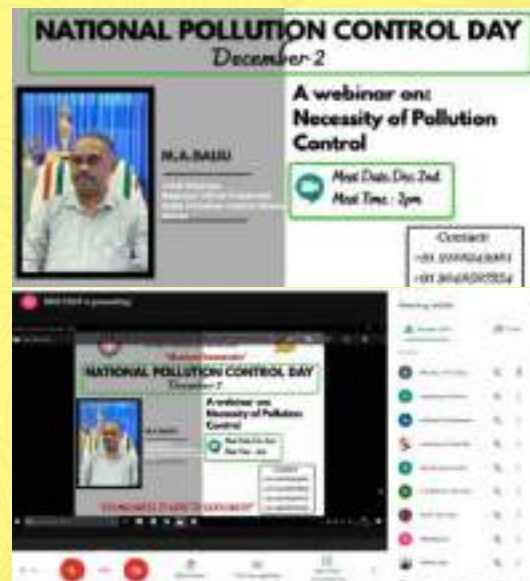
## NATIONAL POLLUTION CONTROL DAY

On December 2<sup>nd</sup> 2020, the NSS Unit 104 and 568 conducted 'Necessity of Pollution Control', a program organized as a part of National Pollution Control Day. It is observed on this day in memory of people who lost their lives in the Bhopal gas disaster. The industrial accident occurred in 1984 when the gas Methyl Isocyanate leaked on the night of December 2–3 and killed thousands.

The event focused on spreading the message of conserving our environment for a better tomorrow for society. To create an eco-friendly surrounding, to reduce the usage of plastic, and to make create awareness about a Green World.

The session was handled by M. A Baiju, Kerala State Pollution Control Board chief engineer who inspired these young minds with his commendable talk. He did his degree from M A college and his Masters from GEC, Thrissur. He has spent his glorious effort from 1992 in the Pollution Control Board. The event was blessed with the presence of FISAT Principal George Issac, Dr Aniyamma Chacko retired Professor (M A College of Engg). NSS Programme Officers Mr. Sajan S and Ms. Beenu Rijju also joined the meeting.

The meeting was conducted in Google Meet due to the Covid-19 situation. M. A Baiju took the webinar on the above-mentioned topic. He was able to enlighten the youth with his experience and ideas. All the attendees gave positive feedback about the event. It was a two-hour session which was very useful and thoughtful for everyone.



## CHIRIKKUDUKKA

There is no garden as beautiful as Childhood. Every child is a different kind of flower; together they make this world a beautiful garden. A day marking childhood, Children's Day celebration



focuses on children and their enjoyment. The day is celebrated to pay tribute to legendary freedom fighter and our first Prime Minister Pandit Jawaharlal Nehru popularly known as Chacha.

In the light of Children's Day 2020, The NSS unit 104 & 568 conducted an online competition featuring kids. Participants were asked to submit photographs of kids below the age of 10 giving his/her earnest and innocent smile. The contest began on November 14th 2020. The photographs were uploaded in The FISAT NSS Instagram page on November 15th 2020. The winners of the contest were declared on the basis of number of likes received for the photo in instagram. Instagram page was adorned with beautiful kids smiling innocently. The competition ended on November 2020 at 6 p.m. The winners of the contest were Rudra Sujith (First), Minna Mariyam (Second) and Madhav (third).

## SANNADHASENA ORIENTATION

The NSS unit 104 & 568 conducted orientation program on "Sannadhasena". Recently the natural calamities and disasters back fired our society but we bravely faced and overcame all these issues with the help of personalities who is ready to do volunteer works. Sannadhasena is a government organization formed by kerala state disaster management in an effort to face any disasters that can happen. It's a group of volunteering personalities who is ready to do volunteer in such crucial situations.

An orientation programme on Sannadhasena was conducted on November 20th 2020 via Google Meet. The orientation program was inaugurated by the director of Jeevana Samridhi MR. Subin Jacob who delivered a keynote speech highlighting the importance of volunteering activities. Further the orientation program was led by the sannadha sena master trainers Mr. Sarad and Ms. Aleena. The session helped to gain awareness about importance of Sannadha sena organization, its working and how to become a part of this organization. The session was quite informative and interesting. An icebreaking session was conducted for the volunteers which allowed the volunteers to clear their doubts.



After the session a good number of NSS volunteers showed their interest to be a part of Sannadhasena. More than 40 of the volunteers registered in Sannadhasena portal. The session helped the students to realize how important is volunteer work for the society.

The master trainers from FISAT Amal Shammy and Seethe M N conducted the orientation programme in other colleges also. The feedback from those colleges was quite impressive too. A good number of volunteers registered in Sannadhasena portal through the session conducted there.



## THANAL

### BIRTHDAY TREE PLANTING CHALLENGE

"A tree is the best friend of man on earth." When we use trees respectfully and economically, we have one of the greatest resources on earth. Trees are rightfully called the 'lungs of the earth.' Life on earth would cease to exist in the absence of trees. Trees are responsible for sustaining the environment in several ways. Tree plantation is significant in the current age of climate change and global warming. Planting trees is important as they improve the life and fulfil essential needs of mankind.

We all must take an initiative to plant trees on each and every day possible; especially, on the occasions. So, we being NSS volunteers, we all take this opportunity on our birthday to plant a tree and contribute the environment in maintaining its ecological balance.

So, why not celebrate birthdays by planting birthday tree and see your birthday tree growing as you grow. Therefore, let as a pling leave a mark but not the footprint on your birthday and to make your birthday meaningful.

The FISAT NSS Unit 104 & 568 conducted a birthday tree planting challenge named, "Thanal". Thanal is a tree planting process that was conducted based on the birth dates of volunteers. With the motto, "Celebrating your birthday by planting a sapling. It grows along with you and gives you happiest smile on their blossoming."

Planting a tree is a lifelong investment. How well this investment grows, thusen sures it will provide environmental, economic, and social benefits through out its lifetime. All the volunteers put in their great time in participating the event by planting trees on their birthdays.



Open Street Map provides global map data in an unified tagging schema. The geodata underlying the map is considered the primary output of the project. The idea of organising this awareness programme is to inculcate the fundamentals, key concepts of OSM and related aspects among students.

Mr. Sreeraj V Speaker emphasized the usage of OSM in the production of paper maps and electronic maps for geocoding of address, place names and route planning. The session was informative, and the resource person very knowledgeable and offered valuable information and tips. The programme ended with Q&A session and followed by feedback session.



## A DAY TO REMEMBER

April 16, 2021

On 16<sup>th</sup> April 2021, the NSS Unit 104 and 568 conducted 'A Day to Remember', at Azhakam Orphanage. Some of the students paid a visit to make a memorable day for the physically challenged children there. Due to rising Covid-19 concern, all weren't able to participate, but other students who were far from the area were present in a google meet.

While planning the event, Mr. Varghese Thudiyam, the manager of the organization was very cooperative and supported the volunteers in all activities. All of the children got the opportunity to engage in many entertaining programs. The efforts of our volunteers made all the children smile.



## OPEN STREET MAPPING

"Knowledge is the new rich, arm yourself with it". Happiness is a way of travel, not a destination. Our brain is mapping the world, often that map is distorted. But it's a map with constant immediate sensory input.

NSS FISAT in association with Kerala IT mission conducted "OSM (Open street mapping) MASS AWARENESS" Programme on 13<sup>th</sup> February 2021 through google meet. Around 180 students attended the session. Mr Sreerag V, the resource person, focused on benefits of OSM as it's a free, editable map of the whole world that is being built by volunteers largely from scratch and released with an open-content license.



## SCIENCERA 2021



In accordance to world science day 2021, The NSS Unit (Unit no. 104 and 568) of Federal Institute of Science and Technology (FISAT) Conducted a quiz competition named SCIENCERA which was open for Classes 10, 11 and 12 of students belonging to any syllabus.

The quiz competition was conducted in three phases.

**The first phase:** The initial phase of the competition consisted of 58 teams from which using an online site as a platform, a selection quiz was conducted and based on points obtained through the selection quiz 18 teams were short-listed.

**The Second Phase:** The second phase involved a live quiz which was conducted by NSS volunteers who were monitored by a teacher. This quiz was conducted through Google Meet platform. From the results of the second phase 5 teams were selected to participate in the third and final phase.

**The Third Phase:** The third phase of the quiz was also a live quiz which conducted through Google Meet platform with Harris sir as the quiz master. In this quiz competition jithin dev R and Anakha Sudheer from KPMHSS poothotta won the first prize.

## DRY DAY OBSERVATION



The NSS unit 104 & 568 conducted a dry day program on May 31<sup>st</sup> 2020. Even though we can't participate as a group to accomplish the program in this pandemic situation so we decided clean our own surroundings. It is very serious practice and we have to maintain cleanliness in our country, which can be better started from our homes, if we really want development in India. We have to understand that our country is our home and then no problem will be there. As being the citizen of the country, we all are responsible for cleaning any dirty place we see. We should keep our roads, tourist places, historical places, schools, colleges, office buildings, etc very neat and clean.

Cleanliness is very important in our life from all the aspects. We should take care of it all through the life. Practice of cleanliness starts from the home and school from the very little age. It affects us very badly when we do not maintain cleanliness.

## VACCINATION CAMP

FISAT as part of meeting its social service commitment has developed a plan to extend the technical support for COVID 19 vaccination drive for the age category of above 60 years in Mookkannoor Panchayath. Withholding its clear vision to build the youth with the mind and spirit to serve the society and work for the social uplift, NSS Unit 104 and Unit 568 on behalf of FISAT provided Covid Vaccination Center (CVC) support in Primary health center, Mookkannoor.

With its team of 30 members, NSS started its extension services on March 12<sup>th</sup>, 2021 coordinated the vaccination support services. A six member team including 2 staff and 4 students per day were deployed to carry out the service which starts from morning 9 am till 3 pm every day is still continuing with same care and social commitment.



The plans so developed are in response to a request from Mookkannoor Panchayath and Mookkannoor Primary health Center on March 5<sup>th</sup> 2021. Two vaccination venues were arranged in the primary health center, to reduce the waiting time and fasten up vaccination of community with health causalities. The team was entrusted with the responsibility to help the beneficiaries to the Government CVC for on the spot registration, appointment, verification and vaccination on the same day.

WHO consultant and medical superintendent visited the Mookkannoor Primary health Center on March 15<sup>th</sup> and extended all appreciation and acknowledged the FISAT team for its timely and expertized social intervention.



The services also included awareness drive that escalated to a larger society through FISAT website and social media channels to spread the message of vaccine essentiality, maintenance of social distancing, proper sanitization and masking



## QUARANTINE PERIOD

April 1-12,2020

The process of knowledge exchange in the 21<sup>st</sup> century was always hassle free until the year 2020 came into picture. Mankind across all geography were affected and had to go through the scorn of isolation, negligence, pain, separation and death. Amidst covid pandemic certain organisations and clubs did their best to keep the youth enriched and pumped with energy during these adverse conditions.

FISAT NSS UNIT 104 & 568 created several platforms to showcase the talents of students and to help them to have a break from the boredom brought by the lockdown. Entries were collected through whatsapp groups and winners were awarded. Contests conducted were as follows:

### Tik-Tok contest

On April 10 NSS FISAT conducted Tik-Tok contest in which videos of duration 10-20 second were evaluated. Results were published on the criteria of both creativity and likes. Competition ended on April 12,2020.



### Book Review & Quarentine selfie

On April 4 quarantine selfie, book review were conducted by NSS FISAT .It was an online platform to showcase talents.The selfies were based on healthy home activities. The competition ended on April 6,2020. There were separate valuation for selfie and book review.



### Photography challenge

On April 7 photography competition was conducted . There was no specific theme for the contest. Deadline of the contest was on April 9 ,2020.



### Drawing & Painting week

On April 1 drawing and painting competitions were conducted. There was no specific theme for the competition. Competition ended on April 3, 2020.



## SEVENDAY SPECIAL CAMP

The NSS unit 104 & 568 conducted a seven day special virtual camp from 21 march 2021 to 27 march 2021. Even though physical activity was compromised, we were able to completely utilize technology to make our camp interesting and productive. The purpose of this camp was to inculcate various values such as social, cultural, moral, educational and ethical within the volunteers. The camp was inaugurated by our chairman, Dr Anitha P along with our programme officer who delivered a keynote speech highlighting the benefits of NSS to both students and the society. An ice breaking session was conducted for the volunteers which allowed the volunteers to get to comfortable within the group. Starting from the very next day, every morning the volunteers attended a yoga session conducted by our college physical education instructor Dr Arun. P. He also explained us the benefits of Yoga and how it must be practiced in our daily life, and how crucial it is to maintain it even during this pandemic. This session also helped the volunteers refresh their minds and gather all positive energy required for the day. We believe that the main aim behind our NSS program is to provide help to everyone who needs it, to enhance and to bring a better change in the standard of living. Keeping this in mind,

We were trained to do Open Street Mapping wherein we spent marking areas and signs in the OSM map. Along with this work which were conducted virtually, a good number of participants had also volunteered at the Vaccination Camp in PHC, Mookkannoor. This time was understood to be really productive and worthwhile when the

participants who were able to visit shared their experiences. On day 5, a resource person from Muthoot Institute Of Technology and Science conducted a session on home energy auditing as a part of the camp. The resource person, Dr Chikku Abraham is a Certified Energy Manager. He explained about the importance of energy conservation along with the various techniques for the same. He encouraged all the volunteers to perform home energy auditing. The late evening session of the camp included cultural activities which made the camp more interesting. On day 3, our cultural event turned out to be pretty grand with Shreya S Ajith the youngest upcoming music composer and also the winner of Indywood Music Excellence Award (2017). She lifted our spirits with her melodious voice and music. Another day all the volunteers gathered to play the very famous game “Among Us”. More cultural events were held and hence made this session a fun filled one. As the camp ended, all the student volunteers had developed their personality through community services. The volunteers understood the importance of time ,got rid of their stage fright, made a lot of friends and learned to socialize.





## KNIMBUS PLATFORM & E-LIBRARY MOBILE APP LAUNCHED.



An e Library platform (Knimbus) is purchased by our library to access digital library

facilities (E Journals and E books) by sitting anywhere in the world. This facility will be available in your desktop, laptop and Mobile phone. Knimbus is a single search platform with great features. It has made it possible to do a one-point search across resources and access the library at any time, from anywhere and on any device. During this pandemic situation, Knimbus has helped us to support our users, meet their needs and ensure our library e-resources are used regularly for their research and learning.

mLibrary mobile app brings E Learning and multimedia at your fingertips. It provides complete FISAT e library in your pockets. The Mobile eLibrary App mLibrary offers a multi-format, content delivery App for



users to consume eBook collections, eCourse materials, latest journal issues and multimedia learning content. Patrons can access the entire library on their smart phone from anywhere, at anytime. Knimbus Mobile App is available for both Android and iOS. A smartphone with internet connectivity is required to use the Mobile App.

## URKUND (PLAGIARISM CHECKER)-OUR ORIGINAL IS AVAILABLE NOW!

Ouriginal is a software solution that combines text-matching with writing style analysis, enabling educators and users to assess the authenticity of any text. It helps to create an environment which fosters fairness and sparks creativity among students, facilitating personal development by unlocking their full potential.

The Software is available in our library. During this pandemic situation this software is of great help to all our research scholars.



## NATIONAL DIGITAL LIBRARY CLUB (NDLI CLUB)

National Digital Library of India Club (NDLI Club) is an enabler of career progression for students, job seekers, researchers and learners. NDLI Clubs are set up in institutes and nodal bodies, and these Clubs conduct events to facilitate students to develop knowledge, skill and traits beyond regular curriculum which are essential for their progression in respective professional domain. The events may be either physical or virtual. Virtual events are web-based and are conducted through the NDLI Club portal. NDLI Club members can access a huge repository of free and open access learning resources, from anywhere and at any time, either through desktop PC or laptop or tablet or mobile, from National Digital Library of India (NDLI) (<https://www.ndli.gov.in> or <https://ndl.iitkgp.ac.in>).

FISAT is also a part of this NDLI Club, Club Registration Number: INKLNC44LCHHD6E.



## ORIENTATION PROGRAMME & WEBINAR

- ♦ The Library and Information centre conducted a five day library orientation sessions for the first year B.Tech students through Webex. Mr. Sino Varghese, Chief Librarian was the resource person.
- ♦ The Library organized a webinar on “Usage of E journals” for Management students on July 8<sup>th</sup> 2020. Mr. Nandalal T S from EBSCO was the resource person.
- ♦ The Library organized a webinar on “Value of EBSCO Business Source in research and career development “on November 28<sup>th</sup> 2020. Mr. Nandalal T S from EBSCO was the resource person.
- ♦ The library organized a webinar on “Effective utilization of e resources using FISAT digital library-powered by Knimbus' on May 8<sup>th</sup> 2021. Mr. Venkatesh V, Manager, Training and customer success (Knimbus) was the resource person.

## FISAT IS NOW PART OF NATIONAL DIGITAL LIBRARY OF INDIA

National Digital Library of India (NDLI) is a virtual repository of learning resources which is not just a repository with search/browse



facilities but provides a host of services for the learner community. It is sponsored and mentored by Ministry of Education, Government of India, through its National Mission on Education through Information and Communication Technology (NMEICT). Filtered and federated searching is employed to facilitate focused searching so that learners can find the right resource with least effort and in minimum time. It is built to provide support for all academic levels including researchers and life-long learners, all disciplines, all popular forms of access devices and differently-abled learners. It is designed to enable people to learn and prepare from best practices from all over the world and to facilitate researchers to perform inter-linked exploration from multiple sources. It is developed, operated and maintained from Indian Institute of Technology Kharagpur.



## VAIGA - AGRI HACK (KERALA LARGEST AGRICULTURAL HACKATHON)

VAIGA Agri Hack 2021 is Kerala's largest agricultural hackathon conducted by the Government of Kerala Agricultural department, as a part of the VAIGA Agricultural Fest. The aim of this hackathon is seeking effective solutions for the major challenges faced in agriculture/farming, the agricultural governance sector, as well as the youth's participation in agriculture and farming. Major challenges faced by the agricultural sector are identified and presented as problem statements. School students, higher education students, startups, etc., are given the opportunity to choose these problem statements and work on their effective solutions.

From FISAT, three teams (Team REVEAL led by Reshma R, Code Bots by Paul Elias Sojan and Renegades by Abhay Raj) were selected to the Final Round of total 20. Among these our 2 teams (Team REVEAL and Renegades) were selected to the final round namely Power Judgement.

Team REVEAL - Reshma R, S Haridev Sankar, Derin T Jose, John Paul And Amrutha M of S5 EIE won second prize with cash award of Rs. 75,000/-. They developed a miniaturized vertical pro farm, a fully automated farming model which can be kept interiors of a building.

## Projects done by students to provide a clean and smart campus for the last one year with SWAN

SWAN under the guide ship of all the departments encouraged the students to work on projects and ideas that can be used to make our campus smart as well as a clean, environment friendly campus.

Few of them are listed below.

- ◆ Miniaturized vertical pro-farm (VAIGAAgri Hack 2021- Runner-up)
- ◆ IoT based micro environment monitoring and management system for greenhouses. (VAIGAAgri Hack 2021- Finalist)
- ◆ Design and Fabrication of Incinerator
- ◆ Design and Implementation of Waste Plastic Filament Extrusion Machine for Recycling of LDPE and failed 3D prints
- ◆ Waste Picking Robot
- ◆ A Real Time Water Quality Monitoring System
- ◆ Contactless IR Thermometer
- ◆ Detection of polluted air
- ◆ SprayBee

## AQUAPONICS

As a part of promoting sustainable domestic food production for organic vegetables and fresh fish, nature club of FISAT started a new venture "AQUAPONICS" which is a hi-tech multi farming process in the campus. The fish waste provides an organic food source for the growing plants and the plants provide a natural filter for the water the fish live in. The third participants are the microbes (nitrifying bacteria) and composting red worms that thrive in the growing media. They do the job of converting the ammonia from the fish waste first into nitrites, then into nitrates and the solids into vermin compost that are food for the plants. Aquaponics uses only 1/10th of the water of soil-based gardening, and even less water than hydroponics or recirculating aquaculture.



## SEASONAL VEGETABLES

SWAN works for student-staff involvement in organic farming and cultivation. Food crops like vegetables banana ground nut etc were grown in the available areas in the campus. Vegetable farming producing maximum with minimum depletion of natural resources is practiced here in an eco friendly way. Minimizing the use of pesticides, focus is given to organic vegetable cultivation. Increasing crop diversity is an important step towards cropping systems that mimic natural systems. Common vegetables and cool season vegetables are raised by the Club. Vegetables like Tomato, cow pea, Amaranthus, Spinach, Ladys Finger, snake guard, bitter gourd, green chillies etc are cultivated in three seasons. Thus a production system with different crops grown in the field adds diversity to the cropping system and leads to its stability.



## ONLINE INSTITUTIONAL WORKSHOP ON SWACHHTA

Mahatma Gandhi National Council of Rural Education (MGNCRE), Department of Higher Education, Ministry of Education, Government of India in association with IEDC FISAT, Nature club of FISAT- SWAN and NSS FISAT organized an online Institutional Workshop on SWACHHTA on 29<sup>th</sup> April 2021 from 2pm to 3.30pm. Our Eminent expert for the day was Dr. Dipu Varghese from MGNCRE. Need for students being in blend with nature was emphasized. The function was inaugurated by Dr. George Issac, principal FISAT.



## FISAT ASME INDUCTION TO OUTSIDERS

An induction programme on ASME was conducted on 06/12/2020 for the Students of ILM College of Engineering and Technology. The Induction programme was initiated after a Talk on the Application of Computational Fluid Dynamics by Dr. K E Reby Roy and the induction programme brought in with a view to uplift the level of awareness of students on ASME to an elevated stage. The session was taken by the executive committee members of the ASME FISAT Student chapter, Mr. T M Akshay, Chairman ASME FISAT, Mr. Bain T Baiju, Joint committee chairman ASME FISAT Mr. Ivin Joffy, Secretary ASME FISAT, Mr. Deepak V P, Convener ASME FISAT.

## INDUSTRIAL TALK ON “STANDARDS”

ASME FISAT student chapter conducted an industrial talk on the topic STANDARDS by Mr. K T Jose Managing director HEMAN ROBOPARK on 30 October 2020 via online platform Google meet. It was an expert talk where over 82 students actively took part in the event and gained lots of information. The talk mainly focused on how Standards vary for different countries, different types of nuts, types of spanners and their uses, different welding methods and precautions to be taken. Mr. Jose shared his life-changing success stories with us and motivated us to gulp every essence of knowledge that we can gain. He encouraged us to be enthusiastic and to have quench for ideas, also without any hesitation answered all our queries. His simple and informative words made this session interesting and productive. Being a part of this talk motivated and encouraged our engineering undergraduates to be a step closer towards their successful life.

## SOLIDWORKS TRAINING PROGRAM

ASME FISAT student chapter successfully conducted a two day 'SolidWorks Training Program' coordinated by Mr. T M Akshay via Google meet on 14 November and 15 November 2020. More than 20 students actively participated in this event. The event was focused on enhancing our 3D modelling skill and learning Solidworks from basic sketching to assembling. The whole session was interactive where the participants were able to clarify their doubts regarding the software. In the end, all of the participants were able to create their SolidWorks project and successfully acquired a detailed idea regarding the software and its benefits.

## IoTech – Workshop and Hands-on Competition

Three days Arduino Workshop and Competition session conducted from 18<sup>th</sup> to 20<sup>th</sup> of May 2021. The workshop was taken by Mr. Ashik M.S, adept in IoT



who is currently pursuing his B.Tech degree from GEC-Thrissur. About 60 participants attended the 2 day (3 sessions) workshop and 50 participants among them successfully completed the project submission. The top 3 were selected on the basis of the project submitted they were as follows:

- ◆ SWAGATH PRAKASH, S4EEE ◆ JOPAUL JOY, S4CSEB ◆ SIJIN P.L, S4CSEB

## ENVIRONMENT DAY 2021

On June 5<sup>th</sup>, the Mechanical Department of FISAT in support of ASME FISAT celebrated world environment day with various virtual programs and competitions based on environment and nature.

A Hands-on workshop "PUNERJENI" on sustainable recycling was conducted on June 5th via the Zoom platform. The resource person Mr. Amal Shaji, an alumnus of FISAT and a well-known craft designer, shared his talent in craft making, followed by the craft competition "PUNERJENI". An online photography contest "ART OF NATURE" based on the theme "NATURE" with a prize worth Rs. 500 was conducted from June 4 to 7. As part of the campaign "PLANT AND NURTURE", every Fisatian pledged to plant at least one tree and nurture it.



## ASME SCHOLARSHIPS 2021 -2022

Selection results of ASME Scholarships 2021-2022 were announced on June 11th 2021 and 4 students were awarded different scholarships worth a total of around 6 Lakh.



## DONATION CAMPAIGN FOR ORPHANAGE, AZHAKAM

Students came up with support and interaction program for the children in an orphanage, near Azhakam for their education, and expenditures.



On January 30<sup>th</sup>, 2020 representing the Mechanical Department, Mr. Deepak VP, S6ME, Ivin Joffy, S6ME, Bain T Baiju, S6ME, Antony Francis, S6ME, Bilton Baiju, S6ME along with Mr. Sajan S, Asst. Prof. ME and Arun J Kulangara, Asst. Prof. ME interacted with the members. Students pledged their support to continue the activities. Mr. Varghese Thudian, who oversees the activities of the orphanage was present.



## CANTEEN DESIGN COMPETITION

The Canteen Design competition was organised by the Department of Civil Engineering, in which students of any year and any department had the privilege to take part. In this competition students had to design a new canteen for the campus in the given specifications by either manual drawing or by help with software. This was also a golden chance for the students to mark their signature on campus. The results were declared on 26<sup>th</sup> October 2020. First Prize was bagged by Sinchan Dutta S3CE with a winning cash prize of Rs. 5000, Second Prize was secured by Joseph Thomas S7 EIE with a cash prize of Rs.1000 and third Prize was shared by John Joseph S7CE and Abhina Mariya S3CE.



**Sinchan Dutta**  
S3 CE



**John Joseph**  
S7 CE



**Abhina Maria**  
S3 CE



**MAHESWARAN T  
PARAMESWARAN**

"IEEE Hack Kochi 3.0 Hackathon Winner (1st Prize ORE Category)  
 IEEE Metadz - 2nd Prize  
 IEEE ORION Idea Pitching - 1st Prize  
 IEEE PITCH AND PROTECT - 3rd Prize"



**AKHIL ANIL  
KUMAR**

YouTube Hunt  
 (Cognizance) IEEE -  
 3rd prize



**ALTHAF  
MAKKAR**

YouTube Hunt  
 (Cognizance) IEEE -  
 3rd prize

## STUDENTS ACHIEVEMENT OF IEEE PROGRAM

Hack kochi - IEEE KOCHI HUB-robotics challenge - 1st prize

Metadz-IEEE RAS & IEEE FISAT SB & IEEE NSSCESB- 3D design challenge - 2nd prize

Orion-IEEE PES Kerala chapter & IEEE Women In power- Idea pitching - 1st prize

Pitch and Protect- IEEE Kochin Hub Meet cluster War- Idea pitching - 3rd prize

2ND PRIZE -State Level Energy Quiz -  
 Conducted By APJKTU NSS Energy Cell



**AJANNYA  
JACOB**

District level Power quiz 2nd prize  
 (conducted by KSEB)

FIZZLE competition conducted by IEEE -  
 1st prize"



**GOVIND S  
WARRIAR**



**NAIR SABARI  
VIJAYAN**

IEEE event SENTIA as part of  
 COGNIZANCE 10.0 - 2nd prize



**PRATHYUSH  
JAYAKRISHNAN**



**AKASH S**

YouTube Hunt  
 (Cognizance) IEEE -  
 3rd prize



**SREELAKSHMI  
SUBRAMANIAN**

Primeavara India Trust,  
 SAATHI scholarship  
 2020-21, a CSR  
 initiative by Bosh



**RAHUL S**

First Place in the  
 NPTEL MOOC Test-  
 MSP430 - an online  
 contest on 20th Oct  
 2020 by TI University



**AKASH PRADEEP  
KRISHNA**

District level SECOND  
 PRIZE-online  
 Powerquiz 2020, BY  
 KSEB



## ACTIVITIES OF FABLAB & IEDC

Date	Title of programme	Theme of programme	Coordinators
14/10/2020 to 30/10/2020	IDEA Pitching Competition	Innovation/Entrepreneurship	IEDC FISAT
3/11/2020	One day orientation on FABLAB	Innovation/Entrepreneurship	IEDC FISAT
13/11/2020	Visit to SUPER FABLAB, Kochi	Innovation/Entrepreneurship	IEDC FISAT
5/12/2020	Webinar on “ National Education Policy “ by Dr.Ravikumar K M	Innovation/Entrepreneurship	IIC, IQAC & IEDC
16/01/2021	One day online workshop on” Intellectual Property Rights” by Prof. Moses Dayan	Intellectual Property Rights	IIC & IEDC FISAT
29/04/2021	Online workshop on SWACHHTA	Workshop Orientation	MGNCRE, NSS & IEDC FISAT

- ◆ Awarded with ‘Top Performer’ title in All Kerala FAB Challenge 2020 organized by KSUM & FABLAB, Kochi.
- ◆ Institution's Innovation council (IIC) was constituted for academic year 2020-21.
- ◆ One of the ideas titled 'Portable UV Torch' selected in the initial screening is funded (Rs.17,800/-) by Centre for Advanced Technologies in Disaster Management and Sponsored by Geojit Financial Services Ltd.
- ◆ Active participation of student teams in the ongoing IDEA fest 2021 hosted by KSUM.
- ◆ Six innovative product developments is undergoing development FABLAB.

### RETIREMENTS

#### Dr. SUNNY KURIAKOSE

Dr Sunny Kuriakose took over the reins of the NBA accreditation and certification machinery with a practised ease having spearheaded the NAAC initiatives. With his years of experience in academics and leadership positions as principal, Sunny sir was able to guide the processes in a technical education institution with elan. Guiding and nurturing a team that worked in tandem with the course management is not easy but Sir's ever smiling demeanor, patience and cheerful acceptance of multiple viewpoints and opinions has made it possible.

In leaving FISAT he has left behind a whole battalion of front liners to take up and execute further accreditation works. He has made this possible through his invaluable work management procedures.

Through a spate of farewell gatherings with teaching fraternity, office personnel and non teaching staff, it is clear that sir is already deeply missed. We wish Dr Sunny an excellent innings ahead in his future assignments.



### AN OPPORTUNITY INTERACTION WITH OUR CHAIRMAN

An interactive session between Dr. Anitha P, Chairman, Governing Body, FISAT and the faculty members of the each Department was organised in the month of

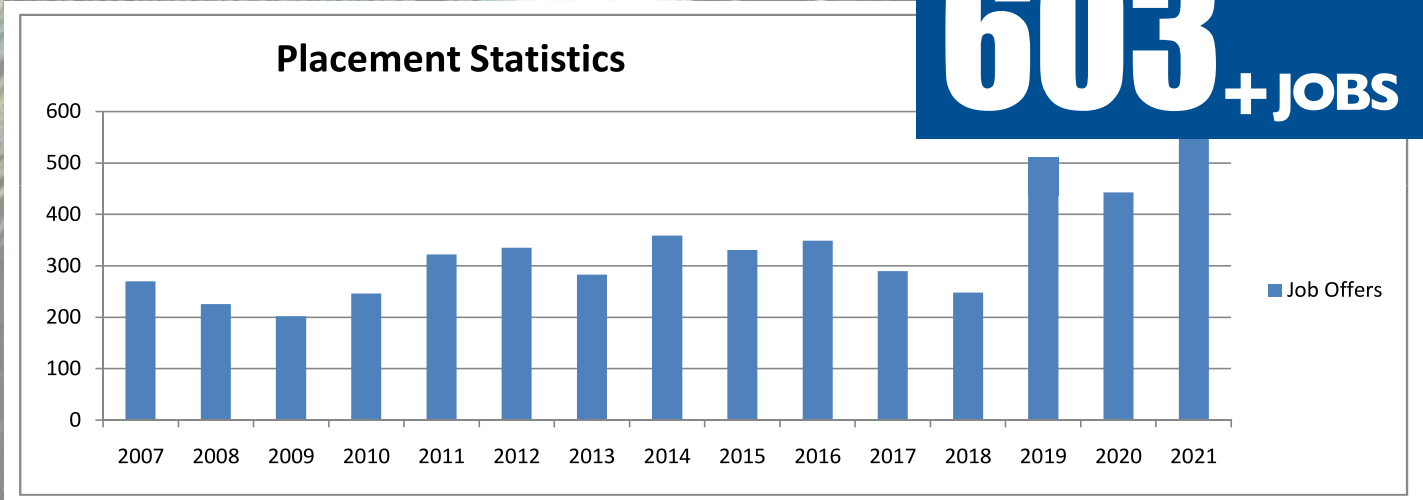


August 2020. In each department. The session was jointly attended by the Principal, Vice principal, Dean Academics and the Head of concerned Department. During the session the Chairman emphasized on the gravity of the current situation due to the covid pandemic and how we should make most of the available resources and move forward overcoming any hurdles thrown our way. Suggestions were also invited from the faculty members on various innovative and effective teaching techniques that could be employed. The meeting was very fruitful and boosted the spirit of commitment among faculty.



# 603 + JOBS

## Placement Statistics



## CAMPUS RECRUITMENT 2021

“Perseverance is the key to success”

The campus recruitment statistics of the 2021 graduating batch showed that the Placement and Training Cell of FISAT has been able to successfully tide over the challenges posed by Covid-19. With 603 offers and many processes underway, the apprehensions have proven to be incorrect. Considering the present economic scenario, the 2021 graduating batch has put forth commendable effort and the results have been outstanding.

The first challenge for the PTC was conducting training programs - online. The Placement Cell in the campus has always given top priority to training programs. The training programs range from general aptitude to technical skills, company specific training programs, resume preparation, GD and interview training. It was a new experience for everyone, moving the training program online and convincing everyone about the effectiveness of such an event posed some challenges in the beginning. Though there was some confusion and hesitance in the initial days, It was the whole hearted effort of the students coordinators which made the training programs successful. The second challenge was moving the recruitment process online. This challenge was easily overcome, since most of the recruiters were willing to conduct the process online. The fact was that many companies were open in terms of recruitment from campuses. The students had to be geared up for this new mode of recruitment process. All big recruiters, TCS, Infosys, CTS, Accenture & Wipro hosted the recruitment in the first phase itself. The biggest recruiter was TCS with 82 offers. Infosys made 34 offers while CTS offered 22 students. There were 10 offers each from Wipro and Accenture. The opportunity in Pricewaterhousecoopers with a package of 6LPA was special for the 2021 batch. They made 3 offers. SOTI also made 3 offers, with a package of 7.5LPA. Some of the major companies were BigBinary, Quest Global, Speridian, 6D, Dexlock, Travancore Analytics, White Rabbit, Mitsogo, NeST, EY, Envestnet, Kalkitech, H&R Block, Byjus, DCT, Zerone, People10, Experion & Sutherland.



## FEDERAL INSTITUTE OF SCIENCE AND TECHNOLOGY

Approved by AICTE, Affiliated to APJ Abdul Kalam Technological University  
 Hormis Nagar, Mookkannoor P.O., Angamaly-683577, Kerala, Ph : 0484 27225272, Email : mail@fisat.ac.in, Web : www.fisat.ac.in