MARIAN
MOMENTS

An Annual Bulletin of Marian Engineering College, Kazhakuttom

Engg. College Code
MCE

Arch. College Code
MCR

ISO 9001:2008 Certified

A Trivandrum Latin Archdiocesan Institution

August 2021

VISION OF THE INSTITUTE
To be an institution offering quality technical education and promoting research with strong ethical values for public good

MISSION OF THE INSTITUTE
To mould the young men and women into technologically up to date, socially conscious and morally sound individuals by providing an inspiring environment of learning for the welfare of the society

FROM THE MANAGERS DESK

"You cannot swim for new horizons until you have the courage to lose sight of the shore."
The human race has shown this courage to slowly rise above the perils of the COVID19 pandemic. I would like to urge my dear students to take effective measures to adapt to these changing conditions. Evolve, is the only mantra which can lead you to success. We need engineers, because, We have a nation to build, we have a world to protect.

I would love to see you students leading from the front in the near future. Make Marian proud. I also take this opportunity to show my deepest gratitude to the teaching faculties of this college. They have shown how competitive and efficient they are by providing the best lectures to their students within the limitations of online teaching. Indeed they are the pillars of this college.

May God bless Marian Engineering College in its future endeavors.

Very Rev. Msgr. Wilfred E

In Association with UST, The Bhoomithrasena Club inaugurated the "MIYAVAKI FOREST" at the college. Manager Very Rev. Msgr. Wilfred E inauguraed by planting the first tree.

NATIONAL SERVICE SCHEME
MARIAN ENGINEERING COLLEGE
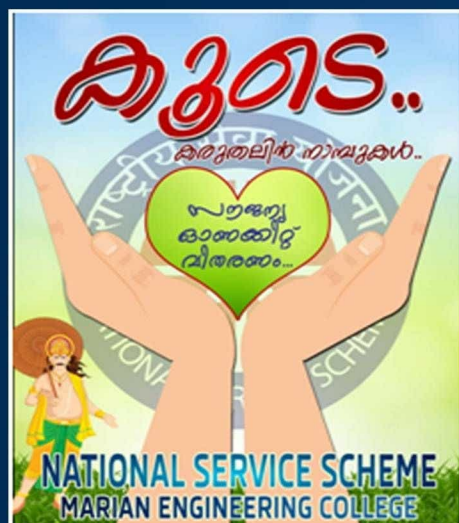
MARIAN ENGINEERING COLLEGE

Marian Career Guidance And Placement Cell (CGPU)

PLACED 2021 PASS OUTS

Sl. No	Student Name	Branch	Company	Sl. No	Student Name	Branch	Company
1	Swaroop J Kesav	CE	Infosys	42	Vaishnav G	CSE	OSPYN
2	Karthika Gopan	CE	Infosys	43	Rahul Krishnan P	CSE	OSPYN
3	Kashif J Naisal	CE	Infosys	44	Litson Thomas	CSE	OSPYN
4	Arya A R	CE	Infosys	45	J Babitha	CSE	OSPYN
5	Shincy S	CE	Infosys	46	Litson Thomas	CSE	Speridian
6	Kashif J Naisal	CE	Byju's	47	Arjun Bijili Gopakumar	CSE	Speridian
7	Nazreen S Ebrahim	CE	Carestack	48	Megha M s	CSE	Speridian
8	Jayakrishna Jayapal	CE	Evobi	49	BERTILA MARY	CSE	RapidValue
9	Viswadevan Nandakumar	CSE	Accubits	50	SURAJ V THOMAS	CSE	ECESIS
10	Pooja Anilkumar	CSE	Accubits	51	Gautam Krishnan	CSE	ECESIS
11	Remijius Brian	CSE	Full Creative	52	Anjali R	CSE	ECESIS
12	Jith	CSE	Full	53	BERTILA MARY	CSE	ECESIS
13	Gopika Sunil	CSE	Full	54	Marvin Clement	CSE	Accenture
14	Joe Ninan George	CSE	Full	55	Gautam Krishnan	CSE	Evobi
15	Gautam Krishnan	CSE	Full	56	Aswin S	CSE	SunTec
16	Vaishnav G	CSE	Full	57	Karthik S K	ECE	Infosys
17	Aswin S	CSE	Full	58	Sruthi Savithri Vijayakumar	ECE	Infosys
18	Viswadevan Nandakumar	CSE	Guidehouse	59	Amritha MR	ECE	Infosys
19	Arjun Bijili Gopakumar	CSE	InApp	60	Adithya S Nair	ECE	Infosys
20	Shriram Rajesh	CSE	InApp	61	Karthik S K	ECE	TCS
21	Sneha A S	CSE	Infosys	62	Sooraj S	ECE	OSPYN
22	Melvin Ebenezer	CSE	Infosys	63	Kripa Binoy	ECE	Speridian
23	Karun Somasundar M	CSE	Infosys	64	Sooraj S	ECE	Speridian
24	Aarcha Thrideep	CSE	Quest Global	65	Gayathri G R	ECE	CSS Corp
25	Aswathy J S	CSE	Quest Global	66	Nikhil Robinson	ECE	Evobi
26	Emy Alphonsa Selastin	CSE	Quest Global	67	Daniel A Pereira	EEE	Infosys
27	Gopika Sunil	CSE	Quest Global	68	Mary Naina Joy	EEE	Quest Global
28	Sandra Sivaprasad	CSE	Quest Global	69	Abbin V R	EEE	Byju's
29	Jith	CSE	TCS	70	Riya Paul	EEE	OSPYN
30	Viswadevan Nandakumar	CSE	TCS	71	Brightson Basil	EEE	VVDN
31	R S Devika	CSE	TCS	72	Daniel A Pereira	EEE	Accenture
32	Sabin Biju Seema	CSE	TCS	73	Ashwin H	ME	Full
33	Marvin Clement	CSE	TCS	74	Ashwin H	ME	Infosys
34	Remijius Brian	CSE	TCS	75	AKASH A S	ME	Infosys
35	Emy Alphonsa Selastin	CSE	Tech	76	Aditya Prasad	ME	Infosys
36	Sooraj S B	CSE	Wipro	77	Arjun Arun	ME	Byju's
37	Aarcha Thrideep	CSE	PWC	78	Abilash S	ME	OSPYN
38	Sambhu S S	CSE	PWC	79	Adarsh A S	ME	Speridian
39	Vijisha Vijayan	CSE	OSPYN	80	Alen Christopher	ME	Speridian
40	Krishnendu Jeevan	CSE	OSPYN	81	Pranav K Praveen	ME	Oracuz Infotech
41	Agfa Chris	CSE	OSPYN	82	Sreeganesh S V	ME	Evobi

OUR RECRUITERS - 2021

MARIAN STARS 2021
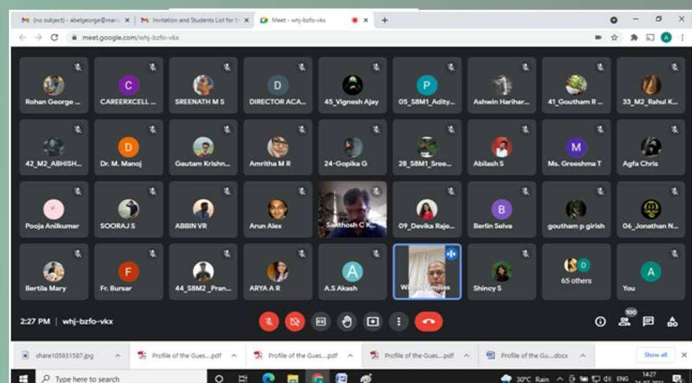
Innovation & Entrepreneurship Development Centre (IEDC)

INITIATIVES OF MARIAN IEDC

Dr. M. Manoj, Nodal Officer initiated and established Marian Center of Excellence in Artificial Intelligence & Machine learning, a project of Dept. of Electronics and Communication. The purpose of the CoE is to scale up the skill set of students in the field of AI & ML, provide an opportunity for training, internship, and working in live projects of companies. CoE signed MoU with the following companies for its activities

a. Accubits Inc(For running Accubits Fellowship Program)

b. UST Global(For running their Flagship Program)

RECOGNITIONS ACHIEVED BY STUDENTS

- Marian IEDC team submitted 58 proposals for Young Innovators program of K- DISC, out of which 52 got selected for mentorship.
- 13 projects were selected by

PATENTS

Two patents were filed last year through IEDC and both the patents were published by Indian Patent Authorities

1 Akash. R. Nair   Walker for Uneven Planes

2 Godwin   Collar Line flip for Shoes

EMPANELMENTS FOR MARIAN IEDC

Marian Engineering College is selected as one among 63 institutions selected in the state by Kerala Development Innovation Strategic Council(K-DISC)for implementing One District One Idea(ODOI) scheme .

START UP COMPANIES REGISTERED THROUGH IEDC

The following Start Up Companies were provided virtual incubation through IEDC this year.

1 SMASH Ananthu Manoj Service Sector

2 Wanderlust   Mridul Joshi Riders App

SEMINARS AND INTERACTIVE SESSIONS

Explore the Unseen in Engineering

The event was conducted by the IEDC chapter of Dept. of Civil Engineering on 22.08.2020. Mr. Jasim Anamangadan, LBS Institute of Technology was the resource person. Students were given an idea about the possible entrepreneurship opportunities , especially in the field of Civil Engineering.50 students attended the session.

Digital Solutions for Infrastructure- Modern Practices

On 29.08.2020, Mr. Mr. Piyush Sinha, Product Specialist Hexagon Geosystems addressed the students and had a webinar on the topic of Digital Solution for infrastructure. The session was attended by 30 students.

Meet the entrepreneur- Kochouseph Chittilapally, Founder, V. Guard

On 22. 09. 2020, 100 IEDC student members interacted with Mr. Kochouseph Chittilapally, Founder of V. Guard Industries. In the session he mentioned about the importance of surviving in this pandemic period and the skill set which would students should acquire for this

Project Management- From 0 to 100

A webinar was conducted on 10.10.2020 for giving an idea about the factors students should practice for managing a project. The session was very much informative and Mr. Shefi Mohammed, Managing Director, Asteriks Engineering Consultants interacted with students on this topic. The session was addressed by 50 students

What's Your Big Idea- Business Idea Contest

The event was organized by team IEDC of various departments of Marian. The event was planned to identify potential technical and business ideas from the students of Marian. The program was conducted Department wise and the best ideas were rewarded by cash price. The identified projects and ideas were hand holded to scale up.

Robotics- Explore the opportunities

A webinar on the topic Robotics was conducted on 09.11.2020 by Mr. Athul Chandrasenan, CTO, Kepler Robotics. The resource person gave an idea about future possible developments in the field of robotics and how should the students train themselves for making use of the opportunities in the field. 50 students registered for the session.

Language Bytes

The event was organised by CSE chapter of Marian IEDC. The program was attended by 30 students and was useful to students those who wish to build a career in the field of programming. The program was conducted on 23.01.2021

Design in everything

On 02.06.2021, Marian IEDC conducted a webinar in the topic Design in everything. The session was handled by Mr. Kiran Padmanabhan, Lead Designer, QBurst. 30 students attended the program and resource person discussed about the significance of applying concept of design thinking in approaching a problem

Career Prospects And Productivity in Digital Era

The event was attended by 80 students of the college and the session was handled by Dr. Arun Surendran, Entrepreneur and academician. Resource person interacted with 80 students on 06.06.2021 and tried to address the concerns and uncertainties they are facing in this digital era, especially during the pandemic situation.

Department of
COMPUTER SCIENCE AND ENGINEERING

STUDENT ACHIEVEMENTS

Abishek C of S6 CSE got placed in Infosys as Systems Engineer through InfyTQ. InfyT is a national level test conducted by Infosys.

Mr. Jith James, Fernandez, Mr. Akshay Mohan, Mr. Sabin Biju Seema and **Mr. Adithya Nair** of S8 CSE won the Best Paper Award in the National Conference on Emerging Technologies in Smart Systems (NCETTSS-2021) conducted by the Department of Computer Science & Engineering ,Marian Engineering College on 6th and 7th July 2021

Mr. Akshay Mohan, Mr. Aswin S. Mr. Sambhu S. S. and **Mr. Melvin Ebenezer** of S8 CSE developed an android application **"Break the Chain Diary".**

Mr. Akshay Mohan, Mr. Aswin S R, Mr. Ajmal Hussain, Mr. Sambhu S S, Mr. Melvin Ebenezer, Mr. Frelbin Nazeer, Mr. Vishnu Jayakumar and **Mr. Jaquish J** of S8 CSE secure Second Prize for the project "Self Assistive Pen" in National Level Hackathon.

Mr. Akshay Mohan, Mr. L.Abhijith Anand, Ms. Bertila Mary, Ms. Maria Manu Joseph and **Ms. Sneha A. S.** of S8 CSE were qualified for Reboot Kerala Hackathon 2020.- Education

Ms. Megha M.S., Mr. Vaishnav G, Mr. Sidharth M, Mr. Surag S Gopi and **Mr. Vineeth B Kumar** were the finalists in Reboot Kerala Hackathon 2020.- Health Care.

Mr. Jith James Fernandez qualified CodeVita coding competition conducted by TCS 2020. Mr. Akshay Mohan Found and reported Security Bug in 'FoodX Store', a food delivery company

Mr. Akshay Mohan, Mr. Jith James Fernandez, Ms. Sandra, Mr. Vishnav, Ms. Megha participated in the Second Level evaluation of the Young Innovators Program (YIP 2020) conducted by the Kerala Development and Innovation Strategic Council.

Ms. Emy Alphonsa Selastin, Ms. Aarcha Thrideep & Mr. Melvin Ebenezer of S8 CSE got Silver in the Nptel course **"The Joy of Computing using Python".**

Ms. Aarcha Thrideep of S8 CSE got Silver in the Nptel course "Introduction to Internet of Things".

Mr. Adish S S of S7 CSE secured first Place in Technical Idea Contest conducted by IEDC on 31/10/2020.

Ms. Sruthy Ajith and Ms. Mrithula S of S5 CSE got 100 percent score in Python Programming Quiz conducted by University Institute of Technology, Trivandrum on 13/08/2020.

Abhishek C
Placed in Infosys
through InfyTQ

Sruthy Ajith
10 GPA in S5

Visakh Bobby
10 GPA in S2

Nandu Krishnan G
10 GPA in S5

FACULTY ACHIEVEMENTS

Dr. Sheeja Agustin elevated to the grade of **IEEE Senior Member**, this membership is an honor bestowed only to those who have made significant contributions to the profession.

Ms. Keerthi Krishnan appointed as the Exam Observer on behalf of the Online Degree Program launched by IIT Madras on 22-11-2020.

Ms. Jyothi Johnson has participated in the Faculty Enablement Program on python Programming through INFYTQ platform conducted in virtual mode through webinar from 06/07/2020 to 13/07/2020 by Infosys Ltd & has been awarded with 'A+' grade.

Ms. Jyothi Johnson, Ms. Nishley Elizabeth and **Ms. Sajni Nirmal** successfully completed the three day Train The Trainer program conducted by Infosys from 16/07/21 to 18/07/21.

Ms. Jyothi Johnson completed NPTEL Online Certification on "Programming in Java" with "Elite" certificate. (Sep-Dec 2020)

Ms. Swapna H completed NPTEL Online Certification on "Applied Natural Language Processing". (Sep-Dec 2020)

Ms. Nisha J R completed NPTEL Online Certification on "Deep Learning". (Sep-Dec 2020)

Ms. Nishley Elizabeth completed NPTEL Online Certification on "Software Engineering". (Sep-Dec 2020)

RESEARCH ACTIVITIES

Ms. Keerthi Krishnan registered for PhD under QIP in Anna University Chennai under the guidance of Dr. K S Easwarakumar. After completing the tenure period, she converted her registration to part time mode. Currently she is in the process of drafting the thesis

Ms. Mercelin Francis was doing her PhD under QIP at Thiagarajar College of Engineering, Madurai - affiliated to Anna University. She submitted her synopsis report and is in the final stage of thesis submission.

Ms. Swapna H & Ms. Nisha J R registered under APJKTU as research scholar under the guidance of Dr. Sonia B & completed the course work. They are doing research in the area Deep Learning

Ms. Jyothi Johnson registered as a part time research scholar in NI University in the year 2020 under the guidance of Dr. Chitra R. She is doing research in the area pattern recognition. Furthermore, she is at present doing her course work as part of the research.

Mr. Sangeeth S joined NIT, Trichy as a full time PhD. Scholar from July 2020 under the guidance of Dr. Chandramani Choudhary. He is doing research in the area data analytics.

NATIONAL CONFERENCE

A two-day National Conference on Emerging Technologies in Smart Systems (NCETSS-2021) was held at department of Computer Science and Engineering in association with Marian Association of Computer Science (MACS) on 6th and 7th July 2021. The conference was inaugurated by the chief Guest Shri. Pramodh Pillai, Group Project Manager, Data and Analytics Unit, Infosys Limited. The keynote inaugural address for the conference was delivered by Shri. Pramodh Pillai. Dr. Anantha Narayanan V, Asst. Professor, CSE, Amrita School of Engineering, Coimbatore gave an invited talk on "Enabling Technologies for Smart Systems".This National Conference was Co-ordinated by Dr. Sheeja Agustin & Ms.Mercelin Francis

Department of
CIVIL ENGINEERING

FACULTY ACHIEVEMENTS

Dr. Narayanan S. published a research article titled '**High temperature effects on different grades of concrete**' in Sādhanā, 46(31), *https://doi.org/10.1007/s12046-020-01536-6*

Ms. Rani V. co-authored a book titled '**Practical Civil Engineering**' published by Taylor and Francis Publications.

Ms. Renju C. M. participated and presented a paper in the International Conference on Emerging Trends in Engineering, Science and Technology organised by the Science Society, Vadodara on 01/08/2020.

Ms. Renju C.M. published a research article titled '**Geopolymer concrete-A state of Art Review**' in IJESC-2020, ISSN2321 3361, Volume 10, issue no: 7,July 2020.

Mr. Kannan K. published an article titled '**Mechanism of Geocell Reinforcement in Soft Soils – A Review**' in Journal of Advances in Geotechnical Engineering, 4(1).

Dr. Archana Satheesh published an article titled '**Effect of in-plan eccentricity on vertically stiffness irregular buildings under earthquake loading**' in Soil Dynamics and Earthquake Engineering, 137 *https://doi.org/10.1016/j.soildyn.2020.106251*.

Dr. Archana Satheesh and the team of final year B. Tech students under her guidance secured Grant-in-aid of Rs. 31000/- for their project under student project scheme by CERD, Govt. of Kerala.

ASSOCIATION ACTIVITIES

Various associations in Civil Engineering department conducted more than 30 technical events in this academic year. Some of them are:

A 5 day workshop on "**Software Training On Plaxis**" by RAM CADDSYS Pvt. Ltd, Chennai on 27th, 28th, 30th, 31st October and 2nd November 2020.

Symposium On **Highway Infrastructure & Tsr** Lecture supported by TC202, ISSMGE on 1st December 2020 to 5th December 2020.

A National Conference on "**Innovations in Civil Engineering-ICE-2021**" organized by Department of Civil Engineering, Marian Engineering College, Trivandrum which was conducted online through Google Meet Platform with a keynote lectures by Prof. Robinson R. G., Professor, IIT Madras, and Dr. K. P. Jaya, distinguished Professor and Director, Centre for Research, College of Engineering Guindy, Anna University on 22nd and 23rd July 2021. The paper presentations spanned over two days under 5 different session, each focusing on a core theme and chaired and co-chaired by experts in the theme. Best paper awards were presented to one paper selected from each core theme by the expert panel.

KTU sponsored FDP on "**DE-HAB Demolition and Rehabilitation of Structures**" organized by Department of Civil Engineering on 26th July 2021 to 30th July 2021

The Department in association with MEC IEI Engineering Student Chapter and organized a webinar on "**Infrastructure Development Role of Kerala PWD**" on 19th June 2021.The session was handled by **Ms. Darlene.C.D'Cruz, Chief Engineer, Public Works Department, Government of Kerala**. The speaker Ms. Darlene.C.D'Cruz explained in simple and concise manner the Infrastructure development role of Kerala PWD. The webinar highlighted the management of construction and maintenance of civil structures owned by government.

The Bhoomitrasena Club of Marian Engineering College in association with KIIDC Ltd, CET (Trivandrum), GEC (Barton Hill), MCET (Anad) and MBCET (Nalanchira) organized a river walk on 9th January 2021 covering more than 10 sampling stations. We have recruited volunteers on "**Water Quality Analysis in Pollution Abatement and Rejuvenation of Polluted River Stretches in Kerala Karamana River**". We have visited sampling stations at **karakulam, Pathamkallu, Vallicode, Kallambara, Pazhakutty, Panavoor, Aryanadu Bridge, Thozhuvancodu Bridge, Peroorkada, Njaramoodu, Marnthoorkadavu, and Thiruvallam**. Each colleges were being assigned respective stretches of river and the same was reported in Mathrubhumi daily.

STUDENT ACHIEVEMENTS

A funding of Rs.31,000/- was procured from CERD,Govt. Of Kerala by **Farha S Fathima, Mohammed SajinSalim, Nikhil P Joseph, Nishara S J** of VI semester for their student project '**Utilization of Pulp black liquor as an admixture in concrete**'.

Ms.Magi N S, M4GT won first prize in **Online Quiz Competition on Environmental Day** by AMETOS, the Civil Engineering Association of MEC on 4thJune 2021.

Mr. Harideth (S4CE) won the second prize in Photography Contest: "**In A Flash**" on 23rd May 2021 to 30th May 2021.

Ms. Anaswara Raj, S8 C2, delivered a classical music concert at the Saraswathy Mandapam of Mookambika Temple, Kollur Karnataka, on 22/10/2020.

Ms. Kalyani S.(S6C) won the second position in Music Competiton: "**Tune It Your Way**"on 27th May 2021.

Department of
ELECTRICAL ENGINEERING

FACULTY ACHIEVEMENTS

Dr. Vijayalekshmy S is Elevated as IEEE Senior Member.

Prof. Valsa Basil completed PhD Course work under KTU.

Prof. Geena S presented a paper **"Design of Power Quality Improvement by using Unified Power Quality Conditioner based on linear distribution system"** in National Conference Advances in Energy Efficient Technologies and **" Power Quality Improvement by UPQC in transmission system"** in International Conference on Recent Scientific Research in Energy & Technology.

Prof . Reethu Dhanya became a certified Class B Electrical Supervisor 150kV LT/MV and 150 kV LT/MV Generator.

Mr . Vishnu S became a certified Class B Electrical Supervisor 25kV LT/MV and 25 kV LT/MV Generator

STUDENT ACHIEVEMENTS

Rahul M A, Vishnu S R , Anuvind Nair S, Sujith S of 2016-20 batch published the paper **Automatic Cooling of Solar Panels** in IRJMETS Vol2,Iss:07, July 2020 under the guidance of Prof. Reethu Dhanya.

Daniel A Periera of S7 , Published a paper **" A wake up call for Electric Vehicles and possible morning for multiple outer rotor in wheel motor drive system"** in IJCRT.

Austin S S of Eighth Semester qualified GATE 2021.

Sam Issac of Eighth Semester qualified CAT 2020.

Lija MS of Fourth Semester won third prize in **'GEO TECHNICO'** competition conducted by IEEESBMCE.

Daniel A Periera of Eighth Semester Completed a five day course on Electric and hybrid vehicle engineering Conducted by IEEE PES RSET.

WEBINAR ORGANIZED

Webinar on **" World of Engineering Opportunities and Possibilities"** was conducted for Plus Two students by Dr. Shaji Jacob on 13th August 2020.

An awareness session on **GATE** and **CAREER GUIDANCE** by speaker M M TRINADH, Teaching Faculty at ACE Engineering Academy, Hyderabad on 8th April 2021.

A webinar on **Industrial Automation** by Mr Faizal Farook, Director of Accurant Engineers & Ivion Industrial Academy Kochi was conducted for sixth and fourth semester students.

A WEBINAR on **'HOMER - Hybrid Optimization of Multiple Energy Resources** by Mr. Arun Gopinath, Quality Assurance Coordinator, Engineering Department, University of Technology & Applied Sciences, Shinas, Oman was conducted on 28/11/2020

Prof Arun J, Head of the Department, Mechanical Engineering gave an inspiring talk to the students on the topic **'Initiating the thinking Process for Creative Design'** via Google meet on 7/11/20

Students were given opportunity to participate in 6 day internship program conducted by **WATTSUN ACADEMY & RESEARCH CENTRE** on SOLAR PV PLATFORM COURSE FOR ENGINEERS . Internship was conducted online mode

CONFERENCE

National conference on Innovations in Renewable Energy Technologies NCIRET 2021 was organized on 11-12th of June 2021. Prof. Geena Suresh and Prof. Sumitra K was the coordinators for this event.

NCIRET 2021: INNOVIZ was inaugurated by **Mr. Balamurali B** scientist CMD Electrical, VSSC ISRO. **Dr. Subha D.** Puthankattil,, Associate Professor, NIT Calicut has delivered a session on **"Renewable Energy"**. **Dr. G Saravana Ilango**, Associate Professor, EEE Department, NIT Trichy has delivered a keynote address on **"Significance of Solar PV System and Effects of Shading"**.

Dr. Edstan Fernandez, Lead Technical Researcher, Electrotechnik PTY LTD. Australia has delivered a session on **"Game Theory in Energy Management"**. **Dr. Deepa S Kumar**, Research and Development Engineer, Power Network, Demonstration Centre UK, has delivered a keynote address on **"Interconnection, Integration and Interoperability of Distributed Energy Sources- Challenges."**

The best paper award was shared by **"Social Distancing Mask"** by Karthik S, John Paul ,Abinston Rox of semester six under Guidance of Prof . Reethu Dhanya and the Paper **" Unmanned Disaster Management Survelliance Machine"** by Brightson Basil, Daniel A Periera, Devika B and Vishnu S Nair of eighth Semester under guidance of Prof . Sumitra Kumari.

ASSOCIATION ACTIVITIES

VIDYUTH 2020 inauguration was held on 26th September 2020 on Google meet, and Vidyuth official site was released. Felicitation ceremony for the top rank holders for current and previous semester KTU University exams were given to the students by the chief guest **Mr. Senthil Kumar A, Scientist/Engineer** (SG), Head-PPEC ISRO.

He also delivered a talk on **Solar Hydogen Generation, Energy for future** was organised on **26th September**, 2020.

Vidyuth conducted a live webinar on 24.10.2020 in the form of an interactive session with **Dr. Jino Joy Thomas,** who was a patent awardee for first geared electric bike (2020).

A department level **logo designing contest** was conducted as part of selecting the logo of the electrical association. The contest was held on 26th September 2020. **Arsha TJ** was selected as the winner of the contest by the judging panel.

Due to the present covid situation the onam celebration was organized virtually involving all the semester students.The celebations was held on 27/8/2020. A varity range of contest was held including online photography contest.

Vidyuth in association with KSEB , conducted **POWER QUIZ 2020** on 11th November,2020. **Ricky Roy** of Sixth Semester came First and Rithu nanda of second Semester held second position .

A college level idea pitching contest was organized online on 17th December,2020. The purpose of the contest was to catch the best idea to a solvable problem statement. A problem statement was given to the participants prior and the participants were to give a workable solution idea. **Mary Naina** of Eighth Semester emerged victorious in the competition. all the participants were given certificates

Department of
ELECTRONICS AND COMMUNICATION

MoU with ACCUBITS TECHNOLOGIES

A Memorandum of Understanding had been signed between **Accubits Technologies** and Marian Engineering College through Department of Electronics & Communication on 27th Jan, 2021. The Department of ECE, has established a Centre of Excellence in AIML with the objective to provide training, facilitate self-learning and enhance skills of students thereby bridge the gap between Industry and Academia. The In-Charge of Centre of Excellence is **Dr.M.Manoj**, Prof.,ECE

CONFERENCE ,FDP , WORKSHOPS

On 14th August, 2020 the Department organized an **International Conference** through Google Meet, on **"Novel Changes in Systematic Electronics"** with an intention to build up a platform that brings in more ideas, designs and creations of novelties in the field of Electronics in a cost-effective way. The Chief Guest for Inaugural and Keynote address was **Dr.Vijant S.Ashirvadam**, Associate Prof.,EEE, Universiti of Teknologi, PETRONAS and the Special Guest of the day was Prof. Sheeja P.George, Joint Director (Research), APJAKTU.

"TRAIN THE TRAINERS- FDP ON FUNDAMENTALS OF AI & ML" Organized on 4th and 5th March, 2021 by the Department of ECE
The Department of Electronics & Communication has arranged an **"Online Workshop on Blockchain Technology and Application"**, with KBAIC (KERALA BLOCKCHAIN ACADEMY INNOVATION CLUB) on 26th Feb, 2021.Resource Person: Mr. Melwin Sunny, R & D Engineer, KBA
Workshop by Mechatronics Club For S5 ECE students From 18th to 29th January, 2021 The students of S5 ECE (2018-2022) were trained by the Mechatronics Club from 18th to 29th Jan, 2021 on programming language Python and HTML, CSS for web development, electronics platforms like Arduino Uno and Raspberry Pi to develop innovative and useful projects

STUDENT ACHIEVEMENTS

7TH SEMESTER ECE STUDENTS (2017-2021)

ANISH M.V   PRANAV P.   NIKHIL ROBINSON

The team came up with a product "AGROSPY" which was selected as one of the 20 products all over erala for VAIGA AGRI HACK 2021 and selected as one among 10 best projects .

HRIDUL JOSHI   ROSHAN S.   ANUSREE S.   ALEENA NEWTON

The team proposed an idea "Riderspal" an application which is useful for riders across india. They won seed money of Rs Two lakhs through Idea grant Scheme of Kerala Startup Mission and were won among 40 teams selected by Government under this scheme.

ASSOCIATION ACHIEVEMENTS

Inaugural Ceremony of association activities conducted on 26th September, 2020.Ms. Sujata E , Joint General Manager , Tata Elxsi was the chief guest.
Expert Talk on Mechatronics For S1 ECE students On 3rd February, 2021 Resource Person-Mr. Maneesh T.,(AP, ME), Faculty-In-Charge., Mechatronics Club ,Sneha A. (Student Coordinator-Mechatronics Club)
An Expert Talk on **"Nurture the Entrepreneur in You"** for S1, S3 ECE students, on 29th January, 2021 Resource Person-Dr. M. Manoj, IEDC Nodal Officer, Marian Engineering College.
Expert Talk on **"Introduction to Machine Learning"** for S3,S5,S7 ECE students on 12th December, 2020 Resource Person- Ms. Sreena V.G, Assistant Professor in ECE, Marian Engineering College
A talk session by the 9 Alumni of ECE working in different areas of Electronics was arranged for the S3 students on 17th Oct, 2020 followed by **Expert Talk on Project Initiatives** by Mr. Shino G. Babu (Director, TIERA) Tips for Technical Writing and Effective Presentation, an event organized by ECE was handled by Ms.Sreena V.G (AP,ECE) and Ms.Minnu Jayan C (AP,ECE) on 24th October, 2020
Centre of Excellence in AI & ML. CEO_AIML was inaugurated on 24th November, 2020 by Mr. Shameer Thaha, Global CSE & CEO, Accubits, Middle East/Africa, Building AI Blockchain Tech.
Workshop on proteus Design Suit 8.0 on 19th September, 2020.The Resource person was Ms.Archa Mohan (Alumnus 2015-2019 ECE), Systems Engineer, Infosys.

PUBLICATIONS

Prof. Vinita B Elza Presented a paper on 'Solar Powered Floating Trash Collector with Water Purifier' in National Conference on Innovations in Renewable Energy Technology conducted by Dept. of EEE, Marian Engineering College on June 11th, 2021.
Prof. Ramola Joy Presented a paper entitled **"Automated Hybrid Lawn Mower"** at the Virtual International Conference on Green Energy & smart Technologies in Engineering (GEST 2021) conducted by JP College of Engineering, Tenkasi, Tamilnadu
Prof. Sreena VG presented a paper on 'Study on Public Chest X-ray Data sets for Lung Disease Classification' in IEEE sponsored International Conference on Signal Processing and Communication ICSPC ' 21 conducted by Karunya Institute of Technology and Sciences on 13-05-2021
Prof. Sreena VG Presented a paper on 'Automatic Uplifting of Pedestrian crossing platform using traffic congestion monitoring' in National Conference on Innovations in Renewable Energy Technology conducted by Dept. of EEE, Marian En gineering College on June 11th, 2021 and won 'Session Best paper Award'.**Prof. Sreena VG** Presented a paper on 'Chest X Ray image classification for Tuberculosis using Deep Convolutional Neural Network' in National Conference on Emerging Technologies in Smart Systems' conducted by Dept. of CSE, Marian Engineering College on July 6th, 2021 and won 'Best paper Award'.

Department of
MECHANICAL ENGINEERING

Congratulations
Prof. Arunkumar V
for receiving his Doctorate
in Nanotechnology from NIT Calicut

FACULTY ACHIEVEMENTS

Prof. Arun J. – Resource person on **"Creative Engineering Design"** at Department of Electrical Engineering, Marian Engineering College on 07.11.2020.

Prof. Manu Mohan published a paper in Applied Thermal Engineering, Elsevier; **"Convective heat estimation of dilute metal oxide nanofluids in VUV surface tuned minichannel using Mach - Zehnder interferometry"**

https://doi.org/10.1016/j.applthermaleng.2021.117259

Prof. Manu Mohan – Resource Person for FDP on **"Advances in Heat Transfer and its Applications"** at Department of Mechanical Engineering, College of Engineering, Perumon from 15.03.2021

Prof. Rajaneesh R Chandran was the chief guest in St. George's College Aruvithura, Kottayam of the Valedictory Function of the Reading Week Celebrations of the college, Grandha 2021 on 6th July 2021.

DEPARTMENT MILESTONES

Green Protocol was implemented in the department from 23.3.2021 and Prof. Ullas Innocent Raj is the Faculty-in-charge.

MODROB funding of 13 lakhs from AICTE. Prof. Maneesh T. is the Faculty-in-Charge.

Team Cavallo is planning to participate in IKR 2021 to be held on November 2021, at Buddh International Circuit, Noida

PROJECTS

CEDS – Proposal from Dr. C. R. Berlin Selva Rex was approved

ANERT – Two research proposals were submitted by Prof. Vishnu B. R., Prof. Maneesh T, and Prof. Ullas Innocent Raj

KSCSTE – Three projects were submitted for approval

WORKSHOPS CONDUCTED

"Recent Trends in Sustainable Biogas Energy and its Applications" for faculty conducted on 12/1/2021,7:00pm. The resource person, Mr. Dipin Nath R S, Managing partner, Encocure Technologies.

Conducted awareness class about **plastic pollution and hands on training program on paper bag making** to S3M2 students on 20.02.2021

NATIONAL CONFERENCE

National Conference on Emerging Trends in Mechanical Engineering- NCETME-2021 successfully on 18.06.2021 with the Theme **"Innovative Technologies for Sustainable Development in Mechanical Engineering".**The conference session started with an elite Keynote Lecture titled **"Source reduction Strategies for Arc Welding Fumes- A Way Forward to Green Welding Fumes"** as per our theme by **Dr. Sreejith Mohan** (Assistant Professor, NIT Trichy). The paper presentations were from the final year B tech students on their project work which consisted of a total of 28 presentations. All the presentations were carried out in 2 online venues. **Prof. Arun S** and **Prof. Joshi S S** of College of Engineering Muttathara chaired the paper presentation sessions of each online venues. The closing session of the conference commenced with a Valedictory speech by The Manager **Rev. Fr.Mssgr. Wilfred**

FACULTY DEVELOPMENT PROGRAM

The department organized a **KTU sponsored one week** faculty development program on **Next Generation Adaptive Manufacturing System.** The sessions were handled by 11 eminent resource persons from various institutions like C & T Consulting Engineers Pvt Ltd, NIT Trichy, CET, MITS- Kochi, Saintgits College, TKM-IT, Mohandas College, Trivandrum & VIT University, and Vellore Campus. Also, there were 62 external participants from various KTU affiliated institutions and 10 internal participants.

WORKSHOP CONDUCTED

Mr. Maneesh T. and Dr. Vishnu B. R. conducted a short term training program from 22nd – 24th June, 2020, on "CAD Modelling Using SolidWorks" for the Technical Staffs of Marian Engineering College

ASSOCIATION ACTIVITIES

MAGMA organized several online seminars during the academic year. **Opportunities in Oil Gas and Petrochemical industries for Mechanical Engineers** - Er. Thomas Ravi Mathew, Project Manager, Sadara Petrochemical Company, Saudi Arabia. **Miyawaki Forest – Simple Solution to Combat Climate Change** -Mr. M R Hari, Managing partner of INVIS multimedia. **Online Workshop on IT skills & Soft skills training About the workshop** - Mr. Alan S Dinsha, Consultant, Avodha Edu-tech Pvt. Ltd., Infopark Campus, Kochi **Webinar on Career Opportunities in Oil and Gas Sector** -Mr. Anas Abdul Basheer, Managing Director of United NDT, Cochin. **An insight into the constitution of India** - Prof. Roy K Varghese, LMCST, Trivandrum , **Back to campus** Mr. Deepak Asokan, Alumni 2006 – 2010 ME