Mr.K.Karthik,M.E.

Assistant Professor – III, ECE Department Velammal College of Engineering and Technology, Madurai e-Mail Id: <u>kk@vcet.ac.in</u> Linkedin id: <u>www.linkedin.com/in/karthik-kannan-584b4065</u> Blog Address: <u>https://kkarthikcn.blogspot.com/</u>

Educational Qualification:

S.No.	Degree	Institution / University	Area of specialization	Year of passing	Class
1.	M.E.	Madras Institute of	Communication and	2007	First class
		Technology /	Networking		
		Anna University			
2.	B.E.	K.L.N. College of	Electronics and	2005	First class
		Engineering /	Communication		with
		Anna University	Engineering		distinction

Experience in Years: 13 Years 6 Months

Employment History:

S.No.	Name of the College /	Designation	Period		Year of Service
5. 110.	Industry	Designation	From	То	rear of Service
1.	Velammal College of Engineering and Technology	Assistant Professor - III	02.08.2016	Till date	5 Years 10 Months
2.	Pandian Saraswathi Yadav Engineering College	Assistant Professor	31.01.2011	29.07.2016	5 Years 6 Months
3.	ASTER Teleservices Pvt. Ltd	2 Years 2 Months			
	Tot	13 Years 6 Months			

Interested Research Areas: Communication, Signal processing and Networking

Scholarships and Awards received:

- Secured top 5% in "Fundamentals of MIMO Wireless Communication" NPTEL course conducted during Jan Mar 2022.
- Received "Outstanding supervisor award" for mentoring students to reach semifinal stage of 2022 Innovate FPGA Design contest

MOOC details

1. SWAYAM Courses:

S.No.	Course	Duration	Score	Performance
1.	Fundamentals of MIMO Wireless Communication (NPTEL)	Jan – Mar 2022	80	Elite - Silver
2.	TI Embedded System Design using MSP430TM MCU (NPTEL)	Jan – Apr 2021	-	Participation
3.	Computer Networks and Internet Protocol (NPTEL)	Jan – Apr 2020	91	-
4.	Computer Networks (CEC)	Jul – Nov 2019	81	Successful completion
5.	Principles of communication systems – II (NPTEL)	Aug – Oct 2019	85	Elite - Silver
6.	Antennas (NPTEL)	Jan – Apr 2019	77	Elite - Silver
7.	Introduction to Internet of things (NPTEL)	Jul – Oct 2018	86	Elite
8.	Basics of software defined radios and practical applications (NPTEL)	Feb – Mar 2018	71	Elite
9.	Satellite communication (NPTEL)	Jul – Oct 2017	53	Successful completion
10.	An introduction to coding theory (NPTEL)	Jan – Apr 2017	60	Elite

2. SWAYAM Mentor details:

S.No.	Course	Duration	Performance
1.	Fundamentals of MIMO Wireless Communication	Jan – Mar 2022	Mentored 35 students, out of which 1 student completed the course successfully
2.	Introduction to Embedded System Design	Jan – Apr 2021	Received MSP430 Lunchbox embedded kits for mentoring 74 students in embedded NPTEL course through TI India UM Program from Texas Instruments (India) Private Limited, Bangalore.
3.	Programming data structures and algorithms using Python (NPTEL)	Jan – Apr 2019	Mentored 34 students out of which 5 students completed the course successfully

3. IIT BombayX Courses:

S.No.	Course	Duration	Performance
1.	Signals and Systems – Part 2	Aug 2021 – Nov 2021	Honour code certificate
2.	Signals and Systems – Part 1	Jan 2021 – May 2021	Honour code certificate

4. Ulektz skill courses:

S.No.	Course	Duration	Performance
1.	Analog communications	March 2022	Successfully completed
2.	Cellular and Mobile Communications	March 2022	Successfully completed
3.	Signal and Systems	March 2022	Successfully completed
4.	Computer Networks	March 2022	Successfully completed
5.	Antenna and Wave Propagation	March 2022	Successfully completed

FDP/STTP/Workshop attended:

S.No.	Title	Duration	Organized by
1.	Digital pedagogy for 21st century teachers	01.03.2022 to 08.03.2022	G.H. Raisoni University
2.	Advanced Communication Systems	28.02.2022 to 04.03.2022	NITTTR - Chennai
3.	Computer Programming using Python	21.02.2022 to 25.02.2022	NITTTR-Chandigarh
4.	Modern technologies for teaching	31.01.2022 to 05.02.2022	P.S.R. Engineering College
5.	Advanced Pedagogy Using Smart Tools	21.01.2022 to 28.01.2022	K.L.N College of Engineering
6.	Application of Machine Learning to Wireless Communication	21.01.2022 to 24.01.2022	IIT - Bhubaneswar
7.	Computer Network and Hardware Maintenance	17.01.2022 to 21.01.2022	NITTTR-Chandigarh
8.	Fundamentals of MIMO Wireless Communication	Jan 2022 to Mar 2022	NPTEL – AICTE
9.	Embedded System Design Methodologies using Intel FPGA	15.12.2021 to 17.12.2021	VCET – Intel Tech.
10.	Machine Learning Applications to Internet of Things- Series III	01.03.2021 to 06.03.2021	Velammal College of Engineering and Technology, Madurai
11.	Free and Open Source Software (FOSS) Tools for Effective Teaching- Learning	15.02.2021 to 19.02.2021	NITTTR-Chandigarh
12.	Machine Learning Applications to Internet of Things- Series II	01.02.2021 to 06.02.2021	Velammal College of Engineering and Technology, Madurai
13.	Automation and Robotics	25.01.2021 to 29.01.2021	NITTTR-Chandigarh
14.	Machine Learning Applications to Internet of Things- Series I	04.01.2021 to 09.01.2021	Velammal College of Engineering and Technology, Madurai
15.	Python Programming for Beginners	29.06.2020 to 04.07.2020	University College of Engineering, Ramanathapuram

R Language and R Studio	22.06.2020 to 5.07.2020	Cambridge Institute of Technology
Adhoc and Wireless Sensor Networks	22.06.2020 to 27.06.2020	Sri Sai Ram Institute of Technology
Advances in Antenna Design Techniques and Simulations using CST Studio Suite	22.06.2020 to 26.06.2020	NITTTR - Chandigarh
Applications of IOT	16.06.2020 to 20.06.2020	NITTTR - Chandigarh
SCILAB	15.06.2020 to 19.06.2020	St. Peter's Engineering College
Role of IOT in Electrical Engineering	10.06.2020 to 15.06.2020	K.S.Rangasamy College of Technology
Skill Development for Effective Research and Teaching - Learning Process	08.06.2020 to 12.06.2020	Anil Neerukonda Institute of Technology & Sciences
Machine Learning for Signal Processing and VLSI	05.06.2020 to 08.06.2020	Anurag University
Digital Initiatives for Higher Education	4.6.2020 to 17.6.2020	G.Venkataswamy Naidu College
ARDUINO	01.06.2020 to 05.06.2020	Kings Engineering College
Outcome Based Curriculum Design	01.06.2020 to 05.06.2020	NITTTR - Chandigarh
Image Processing and Computer Vision	29.05.2020 to 31.05.2020	Anil Neerukonda Institute of Technology and Sciences
Data Science for Biomedical Applications	26.05.2020 to 1.06.2020	Velalar College of Engineering and Technology
Intelligent Robotics & Machine Vision Technology in Current Scenario	25.05.2020 to 29.05.2020	Sri Sai Ram Institute of Technology
Data Science using Python	20.05.2020 to 24.05.2020	Kongu Engineering College
Technological Interventions using Wireless Communication	18.05.2020 to 22.05.2020	NITTTR - Chandigarh
	R StudioAdhoc and Wireless Sensor NetworksAdvances in Antenna Design Techniques and Simulations using CST Studio SuiteApplications of IOTApplications of IOTSCILABRole of IOT in Electrical EngineeringSkill Development for Effective Research and Teaching - Learning ProcessMachine Learning for Signal Processing and VLSIDigital Initiatives for Higher EducationARDUINOOutcome Based Curriculum DesignImage Processing and Computer VisionData Science for Biomedical ApplicationsIntelligent Robotics & Machine Vision Technology in Current ScenarioData Science using PythonTechnological Interventions using	R Studio5.07.2020Adhoc and Wireless Sensor Networks22.06.2020 to 27.06.2020Advances in Antenna Design Techniques and Simulations using CST Studio Suite22.06.2020 to 26.06.2020Applications of IOT16.06.2020 to 20.06.2020Applications of IOT16.06.2020 to 20.06.2020SCILAB15.06.2020 to 19.06.2020Role of IOT in Electrical Engineering10.06.2020 to 15.06.2020 to 12.06.2020Skill Development for Effective Research and Teaching - Learning Process08.06.2020 to 12.06.2020 to 12.06.2020 to 12.06.2020Machine Learning for Signal Processing and VLSI05.06.2020 to 08.06.2020 to 17.6.2020Digital Initiatives for Higher Education4.6.2020 to 05.06.2020 to 05.06.2020 to 17.6.2020Outcome Based Curriculum Design01.06.2020 to 31.05.2020 to 1.06.2020 to 31.05.2020 to 1.06.2020 to 1.06.2020 to 1.06.2020 to 29.05.2020 to 29.05.2020 to 29.05.2020 to 20.05.2020 to 29.05.2020 to

32.	Image and Embedded Processing	11.05.2020 to 15.05.2020	NITTTR - Chandigarh
33.	Future Trends in Electronics	2.5.2020 to 4.5.2020	Dr.N.G.P. Institute of Technology
34.	Learning Through Gamification	30.04.2020	PSNA College of Engineering and Technology
35.	Academic Autonomy – Sustaining & Enhancing Quality (in the context of Engineering Education)	12.12.2019 & 13.12.2019	Velammal College of Engineering and Technology, Madurai
36.	Deep Learning and IoT	11.11.2019 to 24.11.2019	Velammal College of Engineering and Technology, Madurai
37.	Antennas	Jan 2019 to Apr 2019	NPTEL – AICTE
38.	Introduction to Internet of things	Jul 2018 to Oct 2018	NPTEL – AICTE
39.	Internet of Things	15.07.2017 to 16.07.2017	Velammal College of Engineering and Technology, Madurai
40.	Digital communication	14.06.2017 to 21.06.2017	Sethu Institute of Technology, Virudhunagar
41.	C# and ADO.NET	26.01.2017 to 27.01.2017	Velammal College of Engineering and Technology, Madurai
42.	Wireless communication	19.12.2016 to 25.12.2016	M.Kumarasamy College of Engineering, Karur
43.	Recent Trends in Communication Technologies	28.08.2015	Velammal College of Engineering and Technology, Madurai
44.	Image Processing and Pattern Recognition – Research	20.03.2015 to 21.03.2015	Thiagarajar College of Engineering, Madurai
45.	Imaging and Object Recognition I & OR	22.08.2014 to 23.08.2014	Vickram College of Engineering, Enathi

Funded Research Projects: Nil

Patent rights received:Nil

Publications Details:

1. Patent Journal Publication Details: Nil

2. International Journal Publication Details:

S.No.	Name of the journal	Title	Year
1.	Journal of Xidian University	An Intelligent Algorithm for Information Extraction from Images of Different Illumination	2021
2.	International Journal of Applied Engineering Research	Survey on content based video retrieval	2014

3. International Conference Presentation Details:

S.No.	Name of the conference	Title of the paper
1.	International conference on Power engineering (POWERCOIN'20)	Design of Multifault Monitoring and Controlling for Electricity Pole
2.	International conference on innovations in engineering, science and technology 2020	An Effficient Selective Block Security Algorithm for IoT Monitoring Applications
3.	6th International conference on Emerging Trends in Engineering & Technology'19(ICETET'19)	Implementation of IOT based Smart Power Monitoring & Controlling system
4.	ICECE,2019	Environment Monitoring & Controlling system using Wireless Protocol
5.	Springer International Conference on Soft Computing Systems, ICSCS-2018	Design and development of laplacian pyramid combined with bilateral filtering based image denoising

4. National Conference Presentation Details: Nil

5. Google Scholar report:

	1	Mr.K.Karthik Assistant Professor Verified email at vcet.ac.in Communication & Networking	FOLLOW
	TITLE E	9	CITED BY YEAR
	Denoising (P Karthikeyan	mpled Contourlet Transform-Based Effective Denoising of Medical Im of Medical Images Using Contourlet S Vasuki, K Karthik Processing for Improved Clinical Diagnosis, 155-183	nages: 2019
L	Image Den P Karthikeyar	Development of Laplacian Pyramid Combined with Bilateral Filtering bising , S Vasuki, K Karthik, M Sakthivel conference on Soft Computing Systems, 211-221	Based 2018

Articles 1-2 V SHOW MORE

6. Book / Book chapter publication details:

S.No.	Title	Publications	Year of publication
1.	Communication Theory	Charulatha Publications Pvt Ltd	2017
2.	Communication Theory (Second edition) ISBN No. 9789388335362	Charulatha Publications Pvt Ltd	2018
3.	Book chapter on "Design and development of laplacian pyramid combined with bilateral filtering based image denoising"	Soft Computing Systems "Springer Nature Private Limited"	2018
4.	Book chapter on "Non- subsampled contourlet transform- based effective denoising of medical images"	IGI Global Publisher	2018