

**Ms. LAVANYA
DEVI S**



Designation:	Assistant Professor				
Qualification:	M.E, Ph.D (Pursuing)				
Area of specialization:	RENEWABLE ENERGY, AI, EMBEDDED SYSTEMS				
Experience : (As On MAY 2025)	Industrial Experience		Teaching Experience		
	-		16.7 Years		
Number of workshop / FDP attended:	Number of Workshops		Number of FDPs		
	10		30		
Publications:	Conference		Journal		
	Natio nal	International	SCI	Scopus	Others
	3	10	1	5	3
Patents:	National		International		
	3 Published				

Professional Body Membership:	IEI - LM 76150 ISTE- M-1567211 IEEE: 100397947
Staff Achievements:	<ul style="list-style-type: none"> • Mentor for the NPTEL Course Design Technology and Innovation • Mentor for the NPTEL Course Fundamentals of Machine Learning and Deep Learning. • NPTEL Discipline star and Believer 2025 • Participated as ATAL mentor for the ATL Tinkerpreneur event organized by Atal Innovation Mission in 2024. • Participated as Proctor for the IEEE Xtreme 17.0 event organized by IEEE in October 2024. • Top performing Mentor in the NPTEL Course Computer Networks and Internet Protocol. • NPTEL Enthusiast and Believer 2025. • Received the best paper award for "Real-Time Sewage Surveillance And Management system Incorporating Internet Of Things" from Velammal Institute of Technology.Velammal Knowledge Park" , Chennai -Kolkatta High Way, Panchetti,Thiruvallur District on 23rd & 24th March 2023. • Received the best paper award for" Integrated Smart Glasses for Drivers" from Surendra Institute of Engineering & Management, Siliguri, West Bengal on 16th and 17th 2020. • Received the Best performer award from Jerusalem College of Engg., Chennai

Workshop Details:

- Active participant in One Day Workshop on Research Ideas in Power Electronics and Power Systems conducted by the Department of Electrical and Electronics Engg., Jerusalem College of Engg., Chennai.
- Participated in one day author workshop on “how to write research papers effectively” conducted by University Library, Anna university Chennai jointly with ELSEVIER India on 6th September 2019.
- Participated in one day workshop on “power electronics circuits simulation and hardware implementation” conducted by Department of Electrical and Electronics Engg., Jerusalem College of Engg., Chennai on 10th December 2018.
- Participated in one day workshop on “Intellectual Property Rights and Innovations” conducted by Jerusalem College of Engineering, Chennai from 8th August 2018.
- Participated in All India Seminar on “recent trends in renewable energy” conducted by Jerusalem College of Engineering Chennai in association with The Institution of Engineers (India) held on 3rd and 4th January 2018.
- Attended seven days National workshop on “Refined Versions of Basic Sciences and their Uplifting Effects on Society(RVBS-2018)” conducted by Jeppiaar Engineering College, Chennai from 6th to 13th August 2018
- Attended 1 day National workshop on “computational concept of cyber security” conducted by Jeppiaar Engineering College, Chennai on 8th March 2018
- Participated in one day author workshop on “how to write research papers effectively” conducted by University Library, Anna university Chennai jointly with ELSEVIER India on 6th September 2019
- Attended Webinar on “Moodle Learning Management systems” organized by Jerusalem college of Engineering, Chennai on 24.06.2020.
- Attended Webinar on “Exploring IOTwith node MCU” by R.Kalyan Koushik, Senior system engineer, Jasmine Infotech Pvt.Ltd, Chennai on 29.6.2020.
- Attended the Online Workshop on Intellectual Property Rights on 10th & 11th April 2020
- Attended Online Research Methodology Workshop by REST Society for Research International from 18 April,

	<p>2020 to 20 April, 2020.</p> <ul style="list-style-type: none"> • Attended webinar " Effective Technical Writing: Thesis vs Paper Part 1 and Part 2" by Dr. S H Jangamshetti BY IEEE Chapter from 27th April 2020 and 29th April 2020. • Participated in five day international workshop on research opportunities in emerging areas in electronics and communication engineering organised by the department of electronics and communication engineering, KPR institute of engineering and technology ,Arassur, coimbatore between 18th July and 22nd July 2022.
<p>FDP Details:</p>	<ul style="list-style-type: none"> • Attended two weeks staff development programme on “Power Electronics for Green Energy” conducted by the Department of Electrical and Electronics Engg., Jerusalem College of Engg., Chennai • Attended Two days Faculty Development Training Programme on “Renewable power systems and Recent embedded controllers” conducted by the Department of Electrical and Electronics Engg., Rajalakshmi Engineering College, Chennai during 4th and 5th December 2017 • Attended Anna University sponsored 7 days Faculty Development Programme on “Circuit Theory” during 27th Nov to 3rd Dec 2017 conducted by the Department of Electrical and Electronics Engg., Jerusalem College of Engg., Chennai. • Attended Anna University sponsored 7 days Faculty Development Programme on “ Electrical Machines II ” during 4th to 10th June 2018 conducted by the Department of Electrical and Electronics Engg., Jerusalem College of Engg., Chennai • Attended 1 day Faculty Development Programme on “ Adapting The Breakthroughs in Industry4.0" on 10th Dec 2018 conducted by the Department of Electronics and Instrumentation Engg., Jerusalem College of Engg., Chennai

- Attended Anna University sponsored 2 Week Faculty Development Programme on “ Industrial Instrumentation-I ” during 28th Nov to 10th Dec 2018 conducted by the Department of Electronics and Instrumentation Engg., Jerusalem College of Engg., Chennai
- Attended One day FDP on Transforms and Develop the research work in Patent organized by JCE, on 21.06.2019.
- Attended the Faculty Development Programme on Moodle learning management system conducted by Department of Computer Science, Kaypeeyes College of Arts and Science in association with Spoken Tutorial, IIT Bombay from 29/04/2020 to 01/05/2020
- Attended FDP on "Research Methodology: Tools & Techniques".organized by College of Engineering and Technology (CET),IILM-Academy of Higher Learning,Knowledge Park-II, Greater Noida-201306, U.P. on 22/5/2020
- Attended **AICTE Training And Learning (ATAL) Academy** Online FDP on "IOT" by Sai Ram Engg College from 30.11.2020 to 4.12.2020
- **(ATAL) ACADEMY** sponsored Two Week Faculty Development Programme on "Power Electronics Applications to Renewable Energy Systems, Electric Vehicles and Intelligent Control" from 10.10.2022 to 21.10.2022 at Sai Ram Institute Of Technology, Sai Leo Nagar, West Tambaram, Chennai - 44.
- Participated & completed successfully AICTE Training and Learning (ATAL) Academy Blended/Hybrid FDP on "ARTIFICIAL INTELLIGENCE FOR ROBOTICS" from 2023-01-17-2023-01-22 to 2023-01-23-2023-01-27
- at AGNI COLLEGE OF TECHNOLOGY
- Attended One-Week FDP on “Communication, Signal Processing and Advance Technologies For Next Generation Applications ” organised by Budge Budge Institute of Technology, Kolkata in association with IEEE SB (BBIT), held during 20/11/2023 to 24/11/2023.
- Attended three days lecture series " Unveiling the Power of Medical Image Processing : Enhancing Diagnostics and Healthcare Outcomes" held on 16 to 18th October 2023, organised by SRM Institute of Science and technology.

- Attended five days lecture FDP on " Communication Technologies - Connectivity Evolutions" from 27/05/2024 to 31/05/2024, organised by National Institute of Technical Teachers Training and Research, Chandigarh.
- Attended One Week National Level Online Faculty Development Program On Generative AI Models and Applications of Machine Learning held 21/05/2024 to 25/05/2024, organised by Shri Vishnu Engineering College for Women (A), Bhimavaram Vishnupur, West Godavari District, Bhimavaram, Andhra Pradesh .
- Attended five days lecture FDP on " Exploring Wearable Tech and AI Innovations for Personalized Healthcare" from 03/06/2024 to 07/06/2024, organised by Rajalakshmi Engineering College.
- Attended UHV 1 -Inculcating Universal Human Values in Technical Education from 20/05/2024 to 24/05/2024 by All India Council for Technical Education (AICTE)
- Attended five days national level faculty development programme ON "Exploring Computational Intelligence" from 16/07/2024 to 20/07/2024, organised by School of Computer Science and Engineering (SCOPE), VIT- AP University, Andhra Pradesh.
- Attended 15 days industrial training program on Fundamentals Of Quantum Computing from 27/06/2024 to 11/07/2024 by Training from BosonQpsi, Bangalore.

Publication Details:

JOURNAL

- Published paper titled “Maximum Power Point Tracking of Solar Fed Two Level DC to DC Converter”, in **International Journal of Scientific Research and Review (2018)**. [DOI: 16.10089.IJSRR.2018.V7I04.3581.4957](https://doi.org/10.10089.IJSRR.2018.V7I04.3581.4957).
- Published paper titled “Design, Analysis and Comparison of suitable Converters for Photovoltaic System” in the **International Journal of Recent Technology and Engineering (IJRTE)** ISSN: 2277-3878, Volume-7 Issue-5S2, January 2019 [Retrieval Number: ES2031017519/19©BEIESP.\(SCOPUS INDEXED\)](https://doi.org/10.23923/2474-7480/19100055S2019)
- Published paper “Investigations on Wind Fed Power Electronic Converters for Residential Applications” in the **IEEE Xplore -ICONSTEM19**. [DOI: 10.1109/ICONSTEM.2019.8918802. \(SCOPUS INDEXED\)](https://doi.org/10.1109/ICONSTEM.2019.8918802)
- Published paper (2020), on,” Hybrid Green Energy Systems for Uninterrupted

Electrification.” In: Goel N., Hasan S., Kalaichelvi V. (eds) Modelling, Simulation and Intelligent Computing. MoSICom 2020. **Lecture Notes in Electrical Engineering, vol 659, pp 201-208. Springer, Singapore.**
https://doi.org/10.1007/978-981-15-4775-1_22. (SCOPUS INDEXED)

- Published paper "Intelligent Remote Safety Monitoring of Sewage Workers", **International Journal of Scientific Research in Computer Science, Engineering and Information Technology (IJSRCSEIT)**, ISSN : 2456-3307, Volume 9 Issue 1, pp. 90-96, January-February 2023.
<https://doi.org/10.32628/IJSRCSEIT> UGC Journal No: 64718.
Journal URL <https://ijsrcseit.com/CSEIT2390119>
- Published a paper “AI - Managed Irrigation System” in **journal International Journal of Creative Research Thoughts** Volume 11, Issue 9 September 2023. ISSN: 2320-2882 Pg 655-662 [IJCRT2102329.pdf](#)
- Published a paper titled, “Assessment of Novel Self-tuned Emotional Learning-based Intelligent Controller for Bidirectional Cascaded Quasi-Z-Source DC–DC Converter Control” in **Electric Power Components and Systems**, Impact Factor: 1.276
[DOI: 10.1080/15325008.2023.2269927](https://doi.org/10.1080/15325008.2023.2269927) (SCI JOURNAL)
- Published a Book Chapter, “Integrating AI With IoT: Challenges and Solutions. In Merging Artificial Intelligence with the Internet of Things” (pp. 1-32). IGI Global Scientific Publishing. (SCOPUS INDEXED)
[DOI: 10.4018/979-8-3693-8547-0.ch001](https://doi.org/10.4018/979-8-3693-8547-0.ch001)

Conference Details

- Presented a paper titled “Interfacing Of Power Electronic Components For Renewableenergy Resources” in the International Conference on Emerging Trends in Science, Engineering and Technology [ICETSET-2017] on 17th and 18th March 2017 at Jerusalem college of Engineering.
- Presented a paper titled “Implementation of power Electronics converter and Renewable energy Generation Systems” in National Conference on “Smart Grid communication & Internet of things “at Veltech Dr. RR & Dr. SR University on 28th & 29th April 2017.
- Presented a paper titled “Comparitive Analysis Of Power Electronic Converters For Renewable Energy Generation System”, in the AICTE sponsored International Conference on Power & Energy Systems – ICPEs’17 at Velammal College of Engineering and Technology, Madurai, on 21st and 22nd December 2017
- Presented a paper titled “Supervisory controller based fault tolerant inverter for solar systems” in the International conference on “PV Fed irrigation system with MPPT Technique (ICRTSEM-2018)” at Karpaga Vinayaga College of Engineering

and Technology, Padalam, Kanchipuram on 23th and 24th February 2018.

- Presented a paper titled “PV Fed irrigation system with MPPT Technique” in the national conference on “Emerging trends in science ,Engineering& Technology (NCETSET-2018)” at Jersulaem College of Engineering, on 16th March 2018.
- Presented a paper titled “Design, Analysis and Comparison of suitable Converters for Photovoltaic System” in international conference on “ Innovation & Research in Marine Electrical & Electronics Engineering” at AMET University on 28.9.2018
- Presented a paper titled “Wind Fed Power Electronic Converters For Domestic Applications In Power Shed Areas” in IEEE Fifth International Conference On Science Technology Engineering & Mathematics (ICONSTEM 2019) on 16.03.2019 at Jeppiar engineering College, Chennai
- Presented a paper titled “Closed loop Operation of transformerless DC-DC Converter with fuzzy logic controller for photovoltaic system” in the International Conference On Emerging trends in science ,Engineering& Technology (ICETSET 2019) on 22.03.2019 at Jerusalem College of Engineering, Chennai.
- Presented a paper titled “Hybrid Green Energy Systems for Uninterrupted Electrification” in International Conference on Modelling, Simulation & Intelligent Computing (MoSICom 2020)” held at BITS Pilani, Dubai Campus on 29-31 January 2020.
- Presented a paper titled ,” Integration Of Non Invasive Blood Glucose Monitoring Using Visible Laser Light And Serial Monitoring Using Zigbee”, in the AICTE Sponsored International E- Conference On Electrical, Communication And Computing ICECC 20th & 21 st August 2020, at Tagore Engineering College.
- Presented a paper titled,” Smart Glasses for Drivers”, in the International E- Conference on Emerging Technologies held on October 16-17 October 2020 at Surendra Institute of Engineering and Management, Siliguri, Darjeeling Dist. West Bengal.
- Presented a paper titled” Real-Time Sewage Surveillance and Management System Incorporating Internet Of Things” in Velammal Institute of Technology. Velammal Knowledge Park, Chennai -Kolkatta High Way, Panchetti, Thiruvallur District on 23rd & 24th March 2023.
- Presented a paper titled “Green energy automated terrace gardening using IOT” in AICTE Sponsored Fourth International Conference on Emerging Trends in Science, Engineering and Technology (ICETSET 2022) organized by Jerusalem College of Engineering on 7th & 8th July 2022.

Online Courses details

S.No	Online Course	Title	Month and Year
1.	Energy Swaraj Foundation	12 modules course on “ENERGY LITERACY”	March 2023
2	NPTEL	Medical Image Analysis (FDP)	Jan Feb 2023
3		Principles of Management (FDP)	Jan April 2023
4		Accreditation and Outcome Based Learning (FDP)	Aug-Oct 2023
		Introduction to Machine Learning(FDP)	July-Oct 2024
5		Deep Learning - IIT Ropar(FDP)	July-Oct 2024
6		Learning Analytics Tools(FDP)	July-Oct 2024
7		Deep Learning (FDP)	Jan-Apr 2025
8		Natural Language Processing(FDP)	Jan-Apr 2025
9		Ethics in Engineering Practice	Feb-Apr 2025
10		NBA Accreditation and Teaching and learning in Engineering (NATE)	Jan-Apr 2025
11		Python for Data Science(FDP)	Jan-Feb 2025
12		Introduction to Internet of Things	Jul-Oct 2025
13		Teaching and Learning in General Programs: TALG	Jul-Aug 2025
14		Introduction to Operating Systems	Jul-Aug 2025
15		Technical Communication for Engineers	Jul-Aug 2025
16	Patent Drafting for Beginners	Jul-Aug 2025	

LECTURES DELIVERED

- Acted as a resource person in a three days workshop on “Network Devices and its configuration” for III & IV year students from 15.09.2022 to 17.09.2022 at JCE.
- Delivered a Lecture in webinar on “The Art of Writing Project Report and Journal Paper” conducted by the Department of Electronics and Communication Engg., Jerusalem College of Engg., Chennai on 27 May, 2020.
- Delivered a Lecture on “zener diode and varactor diode” in Anna University sponsored 2 Week Faculty Development Programme on “ Electronic Devices ” during 12th Dec to 26th Dec 2018 conducted by the Department of Electronics and Communication Engg., Jerusalem College of Engg., Chennai
- Delivered a Lecture on “Network Theorems” in the Anna University sponsored 7 days Faculty Development Training Programme on “Circuit Theory ” conducted by the Department of Electrical and Electronics Engg., Jerusalem College of Engg., Chennai during 27th Nov to 3rd Dec 2017.