Sri Sai Ram Engineering College

Name:Dr.P.Sivaperumal sivaperumal.eee@sairram.edu.in				
Designation:	Assistant Professor			
Qualification:	M.E., Ph.D			
Area of Specialization:	Power Electronics and Drives, Power Quality, Electric Vehicle			
Experience:	Teaching-8.2years Research – 5 years			
Date of Joining the Institution	01-06-2023			
Number of Workshops/FDP Attended:	30			
Publication:	Journal: International:14 National:00 Conference: National:06 International:06			
General:	To be a eminent in teaching, successful in research by providing value addition to the course through my structured learning, academic skills and analytical skills.			
Staff Achievement	 Appreciation certificate for exemplary contribution as a Pre Screening Evaluator in Smart India Hackathon, 2022, by Ministry of Education innovation cell and AICTE. Appreciation certificate for exceptional contribution as Primary Evaluator In 'Toycathon', 2021' by Ministry of Education innovation cell and AICTE Appreciation certificate for "Young Research Award" to be Finalist conducted by HUMCEN AWARD in the year 2021. 			

ACADEMIC QUALIFICATION:

S. No.	Degree	Year of passing	College	University	Specialization	Class obtained	Full Time/ Part Time
1.	Ph.D	2021	SRM Institute of Science and Technology	SRM Institute of Science and Technology	Electrical and Electronics Engineering	NA	Full Time
2.	M.E	2011	SRM Easwari Engineerin g College	Anna University	Power Electronics and Drives	First Class	Full Time
3.	B.E	2008	Vel Tech Engineeri ng College	Anna University	Electrical and Electronics Engineering	First Class	Full Time
3.	XII	2004	E.C.I. Mat Hr.Sec. School	State Board	Science	First Class	Full Time

RESEARCH INTEREST:

Power Electronics and Drives, Power Quality, Renewable Energy, Electric Vehicle

TEACHINGEXPERIENCE:

S.No	NAMEOFTHEPOST	EMPLOYER	PERIOD OF EMPLOYMENT
1.	Assistant Professor	Sri Sai Ram Engineering College	June 2023 to Till Date
2.	Assistant Professor		February 2020-February 2023
3.	Assistant Professor	Meenakshi College of Engineering	August2011-May2015

RESEARCH TITLE:

[&]quot;Power Quality Enhancement Using Interline Dynamic Voltage Restorer"

SOCIETY MEMBERSHIP

IEEE Membership IEIMembership—AM178459-8 IAENG Member – 275764 IMRTC

NATIONAL & INTERNATIONAL WORKSHOPS ATTENDED

- Has participated in the two weeks Faculty Development Programme on "Industrial Training PV design, ES, Business Opportunity and Challenges", organized by The National Small Industries Corporation Ltd., Technical Service Centre, Hyderabad, 12th September to 26th September, 2022 and Secured A2 grade during performance evaluation.
- HasparticipatedinIPAwareness/Trainingprogramon"NationalIntellectualPropertyAwareness Mission", organized by Intellectual Property Office, Government of India, 11th October, 2022.
- 3. Has participated in the two day National Level workshop (Virtual) on "Art of Academic Writing", organized by Research Cell in association with IQAC of Maharani kasiswari College, Kolkata, 29th and 30th August, 2022.
- 4. Has participated in the International online webinar on "Accreditation Automation Platform for NBA / NAAC / ABET", organized by National Institute of Technical TeachersTraining & Research (Ministry of Education-Government of India), Chennai, 25th March 2022.
- 5. Has participated in the two day online Faculty Development Programme on "Soft Computing Techniques for Electrical Systems", organized by Department of Electrical and Electronics Engineering, Loyola-ICAM College of Engineering & Technology (LICET), 16-17 February 2022.
- Has participated Continuing Education Program on "COMOS for Industry 4.0", organized by Department of Electrical and Electronics Engineering & Academic Cell-AVIT in association with VI Microsystems pvt.ltd, 27-30 July 2021.
- 7. Has participated in the one week online FDP on "Life skills and wellness During Pandemic", 05-11th July 2021, organized by AMET Business School at AMET Deemed to be University.
- Has participated AICTE training and Learning (ATAL) Academy online FDP on "Integration of Alternate Energy Resources in Smart Grid", 25-29 Dec'2020 at National Institute of Technology
 -Delhi.
- 9. Has participated AICTE training and Learning (ATAL) Academy online FDP on "Sustainable Engineering", 14- 18 Dec'2020 at Vellore Institute of Technology -Chennai.
- 10. Has participated AICTE training and Learning (ATAL) Academy online FDP on "Electrical & Computer Engineering", 09- 13 Nov'2020 at National Institute of Technology Meghalaya.
- 11. Has participated in two days workshop on "Modeling and Simulation of Power Electronic Equipments using Multisim", 04-05th June 2021 at AMET Deemed to be University.
- 12. Has participated in the one day National workshop on "Intellectual Property Rights Regime and

- **Its Impact**", 25th May 2021, organized by Electrical and Electronics Engineering in collaboration with Tamil Nadu State Council for Science and Technology at AMET Deemed to be University.
- 13. Has participated in the webinar on "Recent Innovation in Marine Structure", 14th May 2021, organized by Department of Nautical Science at AMET Deemed to be University.
- 14. Has participated AICTE training and Learning (ATAL) Academy online FDP on "**Robotics**", 02-06 Nov'2020 at Motilal Nehru National Institute of Technology Allahabad, Prayagraj.
- 15. HasparticipatedNationalLevelE-FacultyDevelopmentProgrammeon"RoadMaptogetaQuality **Patent**",13 June 2020 at AMET Deemed to be University, Chennai.
- 16. Has participated online Inter-National Webinar on "**Recent Trends in Hybrid Electric Vehicle**", 23 Jan'2021 at Arasu Engineering College, kumbakonam.
- 17. Has participated National level Faculty Development Programme on "Modelling, Technologies, and Control Electric Vehicle", 25-29 May 2020 at AMET Deemed to be University, Chennai.
- 18. Has participated National Level Webinar Series on "High Voltage Engineering", 11-13 May 2020at AMET Deemed to be University, Chennai.
- 19. Has participated in National Workshop, "Real Time System Simulation and Implementation Tools for Power Engineering Applications", on 18-22 December, 2017 at SRM Institute of Science and Technology.
- 20. Has participated in National Level Workshop on "Digital Control of Power Electronic Systems Using dSPACE", 21-22 Sep'2017, at SRM University.
- 21. Has participated in National Level Workshop on "Implementation of FPGA for Power Electronic Drives", organized by SRM University on 24th March 2017
- 22. Attended a Two Day Workshop on "Quanser Real-time Control system workshop" at Anna University & IEI, Chennai.
- 23. Attended a One Day Tutorial Workshop on "Mipower power systems simulation software" organized by PRDC & Vi Microsystem Pvt.Ltd., Chennai.
- 24. Attended Faculty Development Programme on "Flexible AC Transmissions Systems (EE 2036)" 30th Nov 6th Dec,2011 by Centre For Faculty Development ANNA UNIVERSITY at SSN College of Engineering, Kalavakkam.
- 25. Has participated in the intensive workshop on "Industrial Automation Using PLC & SCADA" Organized by Easwari Engineering College in association with Technocrat Automation Solution Pvt. Ltd, Chennai.
- 26. Attended a One Day National Workshop on "Embedded Technologies on Special Machines" at Easwari Engineering College, Chennai.

PUBLICATIONS

International Journal

- 1. **P.Sivaperumal**, S.S.Dash,, K.Mohanraj and C.Balaji, "Switched Coupled Inductor Inverter based Interline Dynamic Voltage Restorer with DWT-ANN Technique", International Journal of Electrical Engineering & Education, 1-18, 2024(SCI IF-0.56).
- 2. **P.Sivaperumal**, S.S.Dash, and k.Saravanan, "Enhancing the power of quality issues using superconducting magnetic storage devices—based dynamic voltage restorer—aided switched coupled inductor inverter with space vector pulse width modulation techniques", Measurement and Control, 52 (9-10), 1329-1343, 2019 (SCI –0.86).
- 3. R. Karthickmanoj, S. Aasha Nandhini, J. S. Ashwin, **P. Siva Perumal**, S. Satish Kumar, "Multi Sensor Data Fusion And Video Streaming Based Mine Safety Monitoring System Through Ip" Journal Of Engineering Science And Technology, 19 (1), 77-85,2024, School Of Engineering, Taylor's University.
- 4. S. Satish Kumar, A. Suresh, M. Sasikumar, T. Sasilatha, D. Lakshmi, P. Sivaperumal, J. S.Ashwin, "Comparative Analysis Of Various Modulation Techniques For Cascaded Multilevel Inverter By Implementing P&O Algorithm" Journal Of Engineering Science And Technology, 19(2), 187-196,2024, School Of Engineering, Taylor's University.
- 5. SatishKumar S, SasiKumar M, Suresh A, Lakshmi D and **Sivaperumal P**, "Investigation of Various Modulation Strategies for T-Type Inverter-fed Renewable Source", Neuro Quantology, Vol.20(11), pp-6352-6357, 2022(Scopus). DOI Number: 10.14704/nq.2022.20.11.NQ66633
- C. Balaji O. Hemakesavulu A. Dominic Savio B. Vinothkumar S. Sakthi, P. Sivaperumal, "A Trasformerless Buck-Boost Converter as Maximum Power Point Tracker for Battery Charging", Lecture Notes in Electrical Engineering, Volume.795, Springer, Singapore, 2021. http://dx.doi.org/10.1007/978-981-16-4943-1 22.
- 7. **P. Sivaperumal**, Subranhsu Sekhar Dash, Sathish Kumar, J.S. Ashwin, "Fuzzy Discrete wavelet Transform aided SCII based IDVR for Mitigating Power Quality Issues", International Journal of Aquatic Science, Vol.12 (3), pp.602-615, 2021.
- 8. Satish Kumar S, Dr M. Sasikumar, **Dr P Sivaperumal**, JS Ashwin, Kavitha Kumari K S, "Implementation Of A Simplified Nine Level Dc-Ac Inverter", International Journal of Aquatic Science, Vol.12(3), pp. 585-592, 2021.
- 9. J.S. Ashwin, D. Vani, **Dr. P.Sivaperumal**, S. Satish Kumar, "Analyzing Reliability And Flooding Mechanism In Multi-Hop Wireless Networks", International Journal of Aquatic Science, Vol.12(3), pp.581-584,2021.
- 10. **P.Sivaperumal** and S.S.Dash, "Power Quality Enhancement Using Interline Dynamic Voltage Restorer with a Fuzzy logic Controller", International Journal of Control Theory and Application (IJCTA), 9(15), 2016, pp.7673-7680. (Scopus Indexed:1.14)

- 11. **P.Sivaperumal** and S.S.Dash, "Enhancement of Power quality problem in grid using custom power devices:, Advances in Intelligent systems and computing, vol.467, springer, 2016.(Scopus)
- 12. K.Barkavi, **Sivaperumal.P** and S.S.Dash, "Grid Integrated Solar Micro Inverter using Space Modulation Technique", **Journal** of Advanced Research in Dynamical and Control Systems(Special Issue), Volume. 10, 2018, pp. 1042-1055. (Scopus Indexed: 0.11)
- 13. Dominic Savio A, Vinothkumar.B, Balaji.C, and **P.Sivaperumal**, "Detection and Tracking of Human activity in the surveillance area", International Journal of Pure and Applied Mathematics, Volume.120, No.6 2018, pp.7713-7725(Scopus).
- 14. **P.Sivaperumal** and C.Gopinath "Design an Interline Dynamic Voltage Restorer for Voltage Sag Compensation Using Z-Source Inverter", International Journal of Electrical Engineering, ISSN 0974-2158 Volume 5(2011), pp.541-554.

International Conference

- J.S.Ashwin, Dr.S.Aasha Nandhini, D.Vani 3, Dr. P.Sivaperumal, S. Satish Kumar, "Multi sensor datafusionandVideoStreamingbasedMineSafetyMonitoringSystemthroughIP", International conference on innovation and Technopreneurship (ICIT), INTI International University Malaysia, 2022.
- 2. S.Satish Kumar, M.SasiKumar, T.Sasilatha, D.Lakshmi, **P. Sivaperumal** J.S.Ashwin, "Design and Comparative analysis of PD,POD,APOD modulation techniques for Cascaded Multilevel Inverter by implementing Perturb & Observe MPPT Algorithm for PV Systems", International conference on innovation and Technopreneurship (ICIT), INTI International University Malaysia, 2022
- 3. **P.Sivaperumal**,S.S.Dash,andS.Satishkumar, "Fuzzy–DiscretewaveletTransformaided Switched Coupled Inductor based Interline Dynamic Voltage Resistor for Mitigating Power Quality Issues", Two Days International Virtual Conference on Innovations and Researchin Marine Electrical and Electronics Engineering (ICIRMEEE 2021) organized by the Department of Electrical and Electronics Engineering, Academy of Maritime Education and Training, Deemed to be University, 17th& 18th June 2021, pp.70.
- 4. Jeesha Agalya and **P.Sivaperumal** "Simulation And Implementation Of Multilevel Inverter Based UPFC", Proceeding of International on Computational Intelligence & Advanced Manufacturing Research-ICCIAMR2013, VELS University, Chennai, April 5th & 6th -2013.

National Conference

- S.Satishkumar, Dr.M.Sasikumar, Dr.P.Sivaperumal, JS Ashwin, & Kavitha kumari K S, "The Repercussions of Social Responsibility Towards Producing Good Citizenship:-HEI", National level virtual conference on Institutional of Quality Assurance Strategies by IQAC in Higher Education Institutions(IQASIH 2022), 15th & 16th February 2022.ISBN:978-93-85434-42-6.
- 2. G.Themozhi, P.Radhakrishnan, G.Tamil Pavai, **P.Sivaperumal**, "A Case Study on Content Beyond the Syllabus", National level virtual conference on Institutional of Quality Assurance Strategies by

- IQAC in Higher Education Institutions(IQASIH 2022), 15th 16th February 2022.ISBN:978-93-85434-42-6.
- 3. Basskaran S, D.Lakshmi, R.Karthicmanoj **P.Sivaperumal**, and S.Satishkumar "Autopilot Car using Raspberry PI", National level virtual conference on Institutional of Quality Assurance Strategies by IQAC in Higher Education Institutions(IQASIH 2022), 15th& 16th February 2022.ISBN:978-93-85434-42-6.
- 4. **P.Sivaperumal** and C.Gopinath "Power Quality Improvements usingIDVR", Proceedings of the National Conference on Modelling, Simulation, Design and Experimental Study of Electrical System MOSDES 2011, B.S.Abdur Rehman University, Chennai, April 11- 2011, pp. 31 36.
- 5. Soundara Vasantham R and **P.Sivaperumal** "High Efficiency Three Phase Tranformerless H6 Inverter", Proceedings of the National Conference on Recent Trends in Electrical and Electronics Engineering (NCRTEE'14), P.B.College of Engineering, Chennai, 7th Mach 2014.
- 6. A.Kohila and **P.Sivaperumal**, "A Module-Integrated Solar Microinverter Using Space Vector Modulation Technique" Proceedings of the National Conference on Recent Trends in Electrical and Electronics Engineering (NCRTEE'14), P.B.College of Engineering, Chennai, 7th Mach 2014.

PROGRAMMES ACTED AS RESOURCEPERSON:

- Has session Co-Chair of ICT Technologies for Renewable Energy, "International Virtual Conference on Innovations and Research in Marine Electrical and Electronics Engineering (ICIRMEE 2021)", organized by Electrical and Electronics Engineering, AMET Deemed to be University, Chennai, 17-18 June 2021.
- Has session Co-Chair of Advances in Electric Vehicles, "International Virtual Conference on Innovations and Research in Marine Electrical and Electronics Engineering (ICIRMEE 2021)", organized by Electrical and Electronics Engineering, AMET Deemed to be University, Chennai, 28-29 May 2022.

BOOK PUBLISHED

- 1. Electromagnetic Theory and Application- Scientific International Publishing House (SIPH), ISBN NO: 978-93-5625-258-5.
- 2. Basic Electrical, Electronics and Instrumentation-EvincepubPublishing,ISBN:978-93-5673- 085-4, First edition(2022).

EDITORIALBOARDMEMBER

- 1. American Journal of Electrical Power and Energy Systems (EPES)
- 2. World Journal of Modern Innovation Research and Review(WJMIRR)

Patent:

➤ P.Sivaperumal, et.al. "DESIGN AND DEVELOPMENT OF AN INTEGRATED PV GRID CONNECTED DC FAST ELECTRIC VEHICLE CHARGING SYSTEM", Patent Granted in 2024, Patent Number:202241000339.

Project:

- P.Sivaperumal, and Prof.Palson Kennedy, "Enhancement and performance of photovoltaic system during uniform and Non-uniform irradiation", proposal Applied in Department of Science and Technology (DST) for Solar Energy Research and Development (SERD-2019), TPN No.46792.
- ➤ S.Satish Kumar (PI) and P.Sivaperumal (Co-PI), "Design and implementation of IBDC converter integrated with Fuzzy controller in marine incinerator applications", proposal Submit in Seed Money Project, AMET Deemed to be University (Rs.60, 000).