

Resume

Dr. M. Muruganandam M.E, Ph.D.,

Associate Professor ,
Department of Electrical and Computer Engineering,
Wollega University,
Nekemte, Oromia, Ethiopia.
E-mail ID:



1. Name : Dr.M.Muruganandam
2. Father's Name : Mr.M.Masilamani
3. Mother's Name : Mrs.M.Neelambal
4. Date and place of Birth : 15th June 1975, Salem, Tamilnadu, India.
5. Nationality : Indian
6. Religion : Hindu
7. Passport Number : J5817839
8. Present postal address/Tel.No/E-mail: Dr.M.Muruganandam
S/o. Mr.M.Masilamani
55, Adhi Selva Ganapathi Street,
Ammamet, Salem District,

9. Educational Qualifications:

| S.No | Degree | Year | Specialization | Grade/ Class | Institute and University |
|------|---------|------|--|---|---|
| 1 | Ph.D | 2014 | Intelligent controller for DC Drives | - | Anna University, Chennai |
| 2 | M.E | 2005 | PED | 78.82 % I Class with Distinction | Mepco Schlenk Engg. College, Anna University, Chennai |
| 3 | B.E | 2003 | EEE | 60.8 % I Class | Govt. College of Engineering, Periyar University, Salem |
| 4 | Diploma | 1996 | EEE | 82.58 % I Class with Honors | Salem Polytechnic, State Board of Technical Education. |
| 5 | H.Sc | 1993 | Maths and Science | 52.08 % I Class | Municipal Boys Higher Secondary School, Ammapet |

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|---|------|------|-------------------|--------------------|--|
| | | | | | – State Board |
| 6 | SSLC | 1991 | Maths and Science | 70.80 % I Class | Municipal Boys Higher Secondary School, Ammapet – State Board |

10. Professional Experience:

| S.No | Designation | Name of the Institution | Nature of Job | Period of service | Years of Experience |
|------|-----------------------|--|---------------------------------------|-------------------|---------------------|
| 1 | Associate Professor | Wollega University, Ethiopia | Teaching, Research and Administration | Oct'15-Till date | 2 Months |
| 2 | Professor | Muthayammal Engineering College, Rasipuram, | Teaching, Research and Administration | Mar.'14-Sept'15 | 1 Year 6 Months |
| 3 | Assistant Professor | Muthayammal Engineering College, Rasipuram, | Teaching, Research and Administration | Nov.'09-Mar.'14 | 4 Years 4 Months |
| 4 | Lecturer | Muthayammal Engineering College, Rasipuram, | Teaching | May.'05-Nov.'09 | 4Years 6 Months |
| 5 | Instructor | Murugesan Polytechnic College, Karipatti, Salem. | Teaching | June'99-July'03 | 4 Years |
| 6 | Electrical Technician | Thangavelu Textiles Pvt Ltd., Salem. | Electrical Maintenance | Oct.'98-May'99 | 8 Months |
| 7 | Technician Apprentice | Tamilnadu Electricity Board, Salem. | Training | Sept'97-Sept'98 | 1 Year |
| 8 | Electrical Technician | Thambbi Modern Spinning Mills Ltd, Salem. | Electrical Maintenance | Apr'96-Sept'97 | 1 Year 5 Months |

Teaching Experience : 14 Years & 6 month

Industrial Experience : 3 Years & 1 Month

Total Experience : 17 Years & 7 Months

11. Books published:

Published 4 Books

❖ Basic Electrical Engineering (ISBN No.: 978-81-8472-000-6)

- ❖ Electromechanical Energy conversion (ISBN No.: 978-81-8472-039-6)
- ❖ Synchronous and Induction Machines (ISBN No.: 978-81-8472-074-7)
- ❖ Electrical Engineering (ISBN No.: 978-81-8472-089-1)

12. Subject Expertise:

- ❖ Embedded Systems
- ❖ Power Electronics
- ❖ Fuzzy Logic And Neural Networks
- ❖ Design of Electrical Apparatus
- ❖ Analysis of Power Converters
- ❖ Advanced Power Semiconductor Devices
- ❖ Simulation of Power Electronic Systems
- ❖ Computer Aided Design of Electrical Apparatus
- ❖ Solid State Drives
- ❖ Electrical Machines II
- ❖ Electrical Machines I

13. Research Publications:

- ❖ International Journals : 56
- ❖ National Conferences : 07
- ❖ International Conferences : 06

14. Workshops/Seminar/Symposium organized:

- ❖ International Conference : 01
- ❖ Workshops : 12
- ❖ Seminars : 04
- ❖ Guest Lecture : 06
- ❖ Symposium : 06
- ❖ Department Competition : 03
- ❖ Certificate/Value added Courses : 02
- ❖ Alumni Interaction : 02

15. Workshops/Seminar/Symposium participated:

- ❖ Workshops : 10
- ❖ Seminar/SDP/Training Program : 08

16. Professional Bodies Membership:

- ❖ Life Member of ISTE (Member No.: LM 70808)
- ❖ Member in IAENG (Member No.: 126481)

17. Country Visited:

- ❖ Visited Dubai (To attend an International Conference “ICEEME'2013”)

18. Journal Reviewer

- ❖ Taylor & Francis (Electric Power Components and Systems)
- ❖ ICTACT (Journal on Soft computing)
- ❖ JEEER(Journal of Electrical and Electronics Engineering Research)
- ❖ CJECE(Canadian Journal of Electrical and Computer Engineering)
- ❖ IJMLC (International Journal of Machine Learning and Cybernetics)

19. Programme Coordinator

- ❖ Fine Arts Club Coordinator of Muthayammal Engineering College
- ❖ As ISTE student branch coordinator, co-ordinate many programme like technical paper presentation, GATE awareness programme and hardware contest etc
- ❖ Co-ordinated Postgraduate and undergraduate project work

20. 100% Result Produced Subjects

- ❖ Computer Aided Design of Electrical Apparatus
- ❖ Analysis of Power Converters
- ❖ Simulation of Power Electronic Systems
- ❖ Advanced Power Semiconductor Devices
- ❖ Design of Electrical Apparatus
- ❖ Fuzzy Logic And Neural Networks
- ❖ Power Electronics

LIST OF PUBLICATIONS

JOURNALS

1. **M.Muruganandam**, N.Senthil Kumar, V.Sadasivam, ‘A Low-cost Four-quadrant Chopper-fed Embedded DC Drive Using Fuzzy Controller’, Published in Inter National Journal of Electric Power Components and Systems, Taylor and Francis, Volume 35, Issue 8 August 2007, pages 907-920.
2. M.Madheswaran and **M.Muruganandam**, “Simulation and Implementation of PID-ANN Controller for Chopper Fed Embedded PMDC Motor” Published in ICTACT Journal On Soft Computing, Volume 2, Issue 3, April 2012 pp 319-324. ISSN: 2229-6956(Online)
3. **Muruganandam, M.** and Madheswaran, M. “Stability Analysis and Implementation of Chopper fed DC Series Motor with Hybrid PID-ANN Controller” Published in International Journal of Control, Automation and Systems, Springer, Volume 11, Issue 5, October 2013. ISSN: 1598-6446 (Print) 2005-4092 (Online)
4. **M. Muruganandam**, M. Madheswaran, “Experimental verification of chopper fed DC series motor with ANN controller” Published in International Journal of Frontiers of Electrical and Electronic Engineering in China, (Springer Publication) Volume 7, Issue 4, December 2012, pp 477-489. ISSN: 2095-2732 (print) 1673-3584 (Online)
5. **Muruganandam, M.**, Thangaraju I and Madheswaran, M. “Simulation and Implementation of an Embedded Hybrid Fuzzy Trained Artificial Neural Network Controller for Different DC Motor” Published in International Journal of Engineering and Technology, Vol. 6, Issue 1, pp. 315-332 February 2014. ISSN:0975-4024 (Online)
6. C Nagarajan, **M Muruganandam**, D Ramasubramanian, “Analysis and Design of CLL Resonant Converter for Solar Panel-battery Systems”, International Journal of Intelligent Systems and Applications (IJISA), Volume 1, December 2012 pp 52-58.
7. **M.Muruganandam**, M.Madheswaran, “Simulation and Implementation of Generalized Hybrid Intelligent Controllers for Chopper fed DC Series Motor” Published in International Journal of Wulfenia, Volume 19, Issue 12, December 2012, Page(s):313-335. ISSN: 1561-882X
8. M.Kirubavathi, G.Dineshkumar and **M.Muruganandam**, “Fault Current and Over Voltage Limitation in a Distribution Network with Distributed Generation Units through Superconduction Fault Current Limiter” Published in International Journal of Engineering Research and Technology, Volume 3, Issue 11, November 2014, Page(s):1442-1445, ISSN: 2278-0181.

9. I.Thangaraju, **M.Muruganandam**, and M.Madheswaran, “Performance Analysis and Experimental Verification of Buck Converter fed DC Series Motor Using Hybrid Intelligent Controller with Stability Analysis and Parameter Variations” Published in Journal of Electrical Engineering and Technology, Vol.10 Issue No.2, March-2015, Page(s) 518-528. ISSN(Print) : 1975-0102, ISSN(online) : 2093-7423.
10. I. Thangaraju, **M. Muruganandam** and C. Nagarajan, “Implementation of PID Trained Artificial Neural Network Controller for Different DC Motor Drive” Published in Middle-East Journal of Scientific Research Volume 23, Issue 4, Page(s) : 606-618, March- 2015, ISSN 1990-9233.
11. I. Thangaraju, **M. Muruganandam** and C. Nagarajan, “Design Simulation and Implementation of Fuzzy Tuned Artificial Neural Network Controller for Chopper fed DC Series Motor using a Low Cost Microcontroller” Published in Middle-East Journal of Scientific Research Volume 23, Issue 6, Page(s): 1091-1104, May-2015, ISSN 1990-9233.
12. M Meera, **M Muruganandam**, “SEPIC Converter Based Switched Mode Power Supply Design for Battery” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 2, Pages 679-686 Feb-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875.
13. M Saranya, S Ramkumar, **M Muruganandam**, “ Modelling and Simulation of High Step-Up DC/DC Converter for On-Site Generation System” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 2, Pages 687-693 Feb-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875
14. M Saravanakumar, C Haris Naveena, **M Muruganandam**, “ Bidirectional Modular Multilevel DC/DC Converter with Wide Range of Control” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 2, Pages 984-989, Feb-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875
15. R Pavithra, **M Muruganandam**, “ A Sensorless Current Controlled DC-DC Converter with Intelligent Control Technique” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 2, Pages 779-786, Feb-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875

16. S Lakshmipriya, RK Raghav, **M Muruganandam**, “A Thirteen Level Inverter Design Based on Hybrid MLI Topology for Minimum THD” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 2, Pages 976-983, Feb-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875.
17. G Maruthaipandian, S Ramkumar, **M Muruganandam**, “ Design and Implementation of BLDC Motor Using Regenerative Braking for Electric Vehicle” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 2, Pages 694-701, Feb-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875.
18. P Ranjitha, V Dhinesh, **M Muruganandam**, “ Soft Switching with Cascaded Transformers to Drive the PMDC Motor” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 2, Pages 787-794, Feb-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875.
19. J Vinoth, T Muthukumar, **M Muruganandam**, “ Implementation of Distributed Maximum Power Point Tracking for Partially Shaded PV Systems” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 2, Pages 702-709, Feb-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875.
20. K Prabha, T Malathi, **M Muruganandam**, “Power Quality Features Improvement In Single-Phase Grid-Connected Inverter With Non-Linear Loads” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 3, Pages 1269-1276, March-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875.
21. R Pavithra Priya, N Sivaraj, **M Muruganandam**, “ A Solution to Unit Commitment Problem with V2G Using Harmony Search Algorithm” Published in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 4, Issue 3, Pages 1208-1214, March-2015. ISSN (Print): 2320 –3765 ISSN (Online):2278 –8875.
22. Haris Naveena.C , S.Dhanapriya, **M Muruganandam**, “ Evaluation of Diabetic Macular Edema From Color Retinal Images” Published in International Journal of

Advanced and Innovative Research, Volume 3, Issue 12, Pages 284-287, Dec-2014.
ISSN: 2278-7844

23. S.Saranraj, A.Sasipriya, S.Ramkumar and **M Muruganandam**, “ A Voltage Controlled PFC SEPIC Converter Based PMBLDCM Drive for Air-Conditioners Using Fuzzy Controller” Published in International Journal of Advanced and Innovative Research, Volume 3, Issue 12, Pages 358-362, Dec-2014. ISSN: 2278-7844
24. M.B.Malayandi, S.Saravanan, **M.Murganandam**, “Design and analysis of Multilevel Boost Converter and Line Commutated Inverter for Universal System ” Published in International Journal of Research in Advent Technology, Volume 3, Issue No.2, Pages 22-27, February 2015. E-ISSN: 3220157
25. V.Bhuvaneswari, S.Saravanan, **M.Muruganandam**, “A Multilevel Inverter Based D-Statcom Control for Distributed Energy Systems” Published in International Journal of Applied Engineering Research Volume 10, Issue Number 9, Pages 8746-8751, April-2015, ISSN 0973-4562.
26. T.Divya, P.Sankar, **M.Muruganandam**, “ Stability Enhancement of Microgrid Using Hybrid Controlled Storage System” Published in International Journal of Applied Engineering Research Volume 10, Issue Number 9, pages 8777-8781, April-2015, ISSN 0973-4562.
27. M.Iswarya, M.Vijayaragavan, **M.Muruganandam**, “ Centralised Optimal Joint Scheduling For Electric Vehicles and Home Appliances Using Smart Microgrids” Published in International Journal of Applied Engineering Research Volume 10, Issue Number 9, pages 8792-8795, April-2015, ISSN 0973-4562.
28. K.M.Janani **M.Muruganandam**, “ Renewable Power Sharing on Power Grid with Performance Improved Inverter ” Published in International Journal of Applied Engineering Research Volume 10, Issue Number 9, pages 8761-8766, April-2015, ISSN 0973-4562.
29. S.Sindhuja, K.Madumathi, **M.Muruganandam**, “ Enhancing the Stability of A Single Bus System Using Shunt Active Filter ” Published in International Journal of Applied Engineering Research Volume 10, Issue Number 9, pages 8744-8747, April-2015, ISSN 0973-4562.
30. C.Viji, A.Sasi Priya, **M.Muruganandam**, “Implementation of Voltage Regulation using Adaptive Voltage Control by Reducing Capacitor Size in PV System” Published

in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1101-1108, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.

31. Meenakshi R, Venkatesan C V, **Muruganandam M**, S.Saravanan, “Implementation of Three Phase Interleaved Converter for Renew able Energy System” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1120-1126, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
32. R.Senthamizhchelvi, S.Saranraj, **Muruganandam M**, “Sensor less Speed Control of PMBLDC Motor” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1127-1133, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
33. S.Arunvijay, M.Praveen Santhoshkumar, **M.Muruganandham**, S.Saravanan “Design and Implementation of Three Phase AC-DC Converter for Dc Drives” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1134-1139, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
34. U.Nandhalaalaa, S.Ramkumar, **M.Muruganandam**, “High Static Gain for Solar Application using Modified SEPIC Converter” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1158-1166, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
35. M.Vanathi, P.M.Manikandan, **M.Muruganandam**, S.Saravanan, “A Modified Seven Level Inverter for Dynamic Varying Solar Power Generation System” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1182-1191, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
36. M.Iswarya, T.Divya, M.Vijayaraghavan, **M.Muruganandam**, “Renewable Energy Integrated Smart Microgrid Scheduling for Electric Vehicles and Home Appliances” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1198-1203, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.

37. M.Saravanakumar, C.Harris Naveena, **M.Muruganandam**, “Design and Implementation Modular Multilevel DC/DC Converter with Bidirectional Wide Range of Control” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1222-1229, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
38. Meera M, Vinoth J, **Muruganandam M**, “Design and Implementation of Non-Isolated Full Bridge LLC Resonant Converter” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1230-1236, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
39. M.Kirubavathi, G.Dineshkumar, **M.Muruganandam**, “Using Superconducting Fault Current Limiter the Fault Current and Over Voltage is Limited in a Distribution Network” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1310-1316, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
40. V.Bhuvaneswari, K.M.Janani, **M.Muruganandam**, “A New and Strange 15 Level Inverter Topology for Harmonic Reduction Using Hybrid Renewable Energy System” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1328-1337, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
41. R.Bashkaran, M.Vijayaraghavan, **M.Muruganandam**, S.Saravanan, “Improving the Stability of DFIG-Based Offshore Wind Farm Using a STATCOM” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1338-1343, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
42. S.Sindhuja, K.Madumathi, **M.Muruganandam**, S.Saravanan, “Improving the Stability of a Two Bus System Using Shunt Active Filter” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1344-1351, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
43. S.Lal, K.Madumathi, **M.Muruganandam**, S.Saravanan, “Battery Energy Storage Station (BESS) Based Smoothing Control of Photovoltaic (PV) and Wind Power Generation Fluctuations” Published in International Journal of Innovative Research in

Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1352-1359, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.

44. K.Surendar, M.Ramya, **M.Muruganandam**, “Control of Reduced Rating Dynamic Voltage Restorer with Battery Energy Storage System Using Fuzzy Logic ” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1391-1398, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
45. P.Ranjitha, V.Dhinesh, **M.Muruganandam**, S.Saravanan, “Implementation of Soft Switching with Cascaded Transformers to drive the PMDC Motor” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1411-1418, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
46. S.Lakshmipriya, R.K Raghav, **M.Muruganandam**, S.Saravanan, “A Simple and Efficient Interleaved Buck Converter for Battery Charging Application” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1419-1426, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
47. R.Pavithra, M.Saranya, G.Maruthaipandiyan, S.Ramkumar, **M.Muruganandam**, “Boost-Half-Boost Photovoltaic System Using SPWM Control and MPPT” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1427-1435, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
48. N.Yuvaraj, B.Deepan, **M.Muruganandam**, S.Saravanan, “Statcom Based of Adaptive Control Technique to Enhance Voltage Stability on Power Grid” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1454-1461, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
49. P.Arivazhagan, B.Deepan, **M.Muruganandam**, S.Saravanan, “Power Sharing Optimization between Gridand Microgrid With Multiple Distributed Generators” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1462-1470, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.

50. S.Sureshkumar, N.Sivaraj, **M.Muruganandam**, “A Hybrid Wind-SolarEnergy System: A New Rectifier Stage Topology” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1487-1493, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
51. P.Vinoth, A.Sasipriya, **M.Muruganandam**, “A New ZCS PWM Full Bridge DC-DC Converter with ANN Controller for PMDC Drives” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1494-1498, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
52. J.Vinoth, T.Muthukumar, **M.Muruganandam**, S.Saravanan, “Efficiency Improvement of Partially Shaded PV System” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1502-1510, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
53. N.Nazzirudeen, G.Dineshkumar, **M.Muruganandam**, “Realization of Harmonic Elimination on Grid Connected Power System with Closed Loop Current Control Technique” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1511-1519, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
54. R.Pavithra Priya, N.Sivaraj, **M.Muruganandam**, “A Solution to Unit Commitment Problem with V2G Using Improved Harmony Search Algorithm” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1553-1559, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
55. M.B.Malayandi, S.Saravanan, **M.Muruganandam**, “A Single Phase Bridgeless Boost Converter for Power Factor Correction on Three State Switching Cells” Published in International Journal of Innovative Research in Science, Engineering and Technology, Volume 4, Special Issue 6, Page (s) 1560-1566, May 2015, ISSN(Online) : 2319 – 8753, ISSN (Print) : 2347 – 6710.
56. I Thangaraju, **M Muruganandam** and M Madheswaran, “Implementation fuzzy tuned artificial neural network controllerfor chopper fed DC series motor using a low cost microcontroller” Published in ARPN Journal of Engineering and Applied Sciences, Volume 10, Issue 12, Page (s) 5083-5093, July 2015 ISSN 1819-6608 (Online)

57. **M Muruganandam**, I Thangaraju and M Madheswaran, "Performance Estimation of Chopper fed DC Series Motor with ANN Controller" Accepted for publication in Iranian Journal of Electrical and Computer Engineering, ISSN 1682-0053.

CONFERENCES

1. **M.Muruganandam** and M.Madheswaran, "Performance Analysis of Fuzzy Logic Controller Based DC-DC Converter fed DC Series Motor" IEEE international conference, Chinese Control and Decision Conference (CCDC 2009), 17-19 June 2009, China, Pages 1635-1640.
2. **M.Muruganandam** and M.Madheswaran, Modeling and Simulation of Modified Fuzzy Logic Controller for Various types of DC motor Drives" IEEE international conference on Control, Automation, Communication and Energy Conservation -2009, 4th-6th June 2009, Erode, Page(s):272 - 277 vol.1.
3. **M.Muruganandam**, N.Senthil Kumar, V.Sadasivam, Design and Simulation of Fuzzy Controller for Closed Loop Control of Four Quadrant Chopper fed DC Drive, PEITSICON-2005, IEE, Kolkata Branch, Science City Kolkata, 28-29 Jan'05,Page(s):125-129.
4. **M.Muruganandam**, R.Sagayaraj, 'Modeling and Simulation of Fuzzy Controlled DC Drive in Comparison with PI controller', ETA-2006, Saurashtra University and Amoghsiddhi Education Society, Saurashtra University, Rajkot, 1-2 Oct.'06
5. **M.Muruganandam**, M.Hemalatha, Kavitha, 'A Neuro-Fuzzy Based Adaptive Vector Control of Induction Motor Drives for Industrial Applications', XETA-2K7, Jayam College of Engineering & Technology, Jayam College of Engineering & Technology, Dharmapuri. 4-5 April'07, pp-43
6. **M.Muruganandam**, M.Hemalatha, N.Senthil Kumar, 'Design And Simulation Of Closed Loop Control Of Chopper Fed Dc Motor Using Fuzzy Controller', ITEES'08, Muthayammal Engineering College, Muthayammal Engineering College, Rasipuram, 22-23 Feb'08, pp-68.
7. **M.Muruganandam**, S.Velmurugan, 'Design and Simulation of modified Fuzzy Controller for Closed Loop Control of Four Quadrant DC-DC Converter fed DC Drive', NCACCA-09, KSR College of Tech, KSR College of Tech., Trichengode, 3-4 April'09, pp-7-13

8. **M.Muruganandam** and M.Madheswaran, “Analysis of Fuzzy-ANN Controller for Closed Loop Control of Chopper fed DC Series Motor with Parameter Variation” has been presented in the International Multi Conference on Automation, Computing, Communication, Control and Management (MultiCon’12) at Muthayammal Engineering College, Rasipuram, on 20th -21st April, 2012.
9. **M.Muruganandam** and M.Madheswaran, “Hybrid PID-ANN Controller for Closed Loop Control of Chopper fed DC Series Motor” has been presented the Second International Conference on Interdisciplinary Research and Development, INRIT2012, 1st June 2012, Thailand.
10. **M.Muruganandam** and M.Madheswaran, “Design of Modified Fuzzy Logic Controller for Closed Loop Control of Chopper fed DC Series Motor Drive Analysis with Motor Parameter Variation” Doctoral Student Conference at Muthayammal Engineering College, Rasipuram.
11. Neelakrishnan and **M.Muruganandam**, “An Improved AC.DC Converter with Quasi active power factor correction”, National Conference Recent Advancement and Challenges in Electrical Engineering and Applications, organized by Institute of Road and Transport Technology, Erode, 29th February and 1st March 2012.
12. S.Ramkumar and **M.Muruganandam**, “Design and simulation of universal artificial neuron controller for chopper fed embedded pmc motor ” 3rd National Conference on Advancement in Electrical Sciences, (NCAES’12), 24th February 2012, Organized by Department of Electrical and Electronics Engineering, SNSCT, Coimbatore-35.
13. **M.Muruganandam** and M.Madheswaran, “Implementation of Hybrid Fuzzy-Neuro Controller for Chopper Fed PMDC Motor” 2nd International Conference on Computer, Electrical, Electronics & Mechanical Engineering (ICEEME'2013), organized by Planetary Scientific Research Centre, March 17-18, 2013, Dubai (UAE).

LIST OF PROGRAMMES ORGANISED

| S.No | Name of the Programme | Title of the Programme | Date | Role in the Programme |
|-------------|------------------------------------|--|-------------|------------------------------|
| 1. | National Level Tech. Symposium | PWR-SPARX-07 | 11.09.07 | Coordinator |
| 2. | Workshop | Embedded Controller for Electrical Systems | 22.01.08 | Coordinator |
| 3. | Seminar | PLC & SCADA | 21.01.10 | Convener |
| 4. | Workshop | LabVIEW | 28.01.10 | Convener |
| 5. | Guest Lecture | Control Systems | 18.02.10 | Convener |
| 6. | Guest Lecture | Fuzzy logic and Neural network | 22.03.10 | Coordinator |
| 7. | Workshop | Industrial Automation | 27.03.10 | Convener |
| 8. | Department competition | Project contest | 04.03.10 | Convener |
| 9. | Workshop | Basic Electrical, Electronics and Instrumentation | 31.07.10 | Convener |
| 10. | Workshop | Real Time Applications of PLC and DCS | 02.09.10 | Convener |
| 11. | National Level Technical Symposium | INSGLITZ'10 | 24.09.10 | Convener |
| 12. | Seminar | Basics of LabVIEW | 10.01.11 | Convener |
| 13. | Guest Lecture | Stability analysis of Control System | 11.01.11 | Convener |
| 14. | Department competition | Technical Quiz | 02.03.11 | Convener |
| 15. | Workshop | Recent trends in Virtual instrumentation using LabVIEW | 11.03.11 | Convener |
| 16. | Workshop | Recent trends in Process Control Automation | 20.08.11 | Convener |

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| 17. | National Level Tech. Symposium | INSGLITZ'11 | 21.09.11 | Convener |
| 18. | Workshop | Embedded system in Industrial Automation | 10.01.12 | Convener |
| 19. | Guest Lecture | Automation in cement industries | 6.03. 12 | Convener |
| 20. | Department competition | Technical Quiz | 24.03. 12 | Convener |
| 21. | Guest Lecture | Embedded system Applications in Instrumentation | 26.03.12 | Convener |
| 22. | AICTE Sponsord Seminar | Recent trends in Virtual Instrumentation | 21.05.12 & 22.05.12 | coordinator |
| 23. | Workshop | Rapid Development of Embedded system using flow code | 30.08.12 & 31.08.12 | Convener |
| 24. | Workshop | Real Time applications of PLC and SCADA | 07.09.12 | Convener |
| 25. | National Level Tech. Symposium | INSGLITZ'12 | 28.09.12 | Convener |
| 26. | Workshop | PLC programming and Applications in Process Control | 20.02.13 | Convener |
| 27. | Value added Course | Lab VIEW- Application to Industrial Automation | 25.06.13 & 26.06.13 | Convener |
| 28. | Alumni Interaction | Over View of BIGDATA | 02.09.13 | Convener |
| 29. | Certification Course | Printed Circuit Board Design & Fabrication Process | 28.06.13 & 29.06.13 | Convener |
| 30. | Fine Arts Club | Essay Writing, Poem Writing, Drawing, and Painting | 26.07.13 & 09.08.13 | Coordinator |
| 31. | National Level Tech. Symposium | INSGLITZ'13 | 06.09.12 & 07.09.12 | Convener |
| 32. | Awards Day | Muthayammal Awards Day-2014 | 08.02.14 | Co-Cordinator |

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| 33. | Guest Lecture | Embedded System Applications to modern Industries | 08.03.14 | Convener |
| 34. | Alumni Interaction | What the Industries require? | 08.03.14 | Convener |
| 35. | Workshop | Applications of Real Time Embedded System with Hands on Training | 18.09.14 & 19.09.14 | Convener |
| 36. | Seminar | MI Power Applications to Power System | 06.11.14 | Convener |
| 37. | National Level Tech. Symposium | E-CON'15 | 04.02.15 | Convener |
| 38. | International Conference | MULTICON'15 | 29.04.15 & 30.04.15 | Convener |

LIST OF PROGRAMS PARTICIPATED

| S.No | Name of the Programme | Title of the Programme | Date | Organized by |
|------|-----------------------|---|----------------------------|--|
| 1 | Orientation Programme | Teaching Methodology For Young Teachers | 05.07.06 To 07.07.06 | Muthayammal Engineering College, Rasipuram |
| 2 | National Seminar | Advanced Power Converters for Special Electrical Drives | 19.07.06 To 21.07.06 | AICTE at Kongu Engg. Clg, Erode |
| 3 | Workshop | Embedded Controller for Electrical Systems | 05.10.07 & 06.10.07 | Muthayammal Engineering College, Rasipuram |
| 4 | Workshop | RESEARCH METHODOLOGY | 09.02.08 | Muthayammal Engineering College, Rasipuram |

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| 5 | Workshop | Industrial Automation on Neuro-Fuzzy and its Applications | 28.05.08 & 29.05.08 | The Kaveri Engg. College, Mechri. |
| 6 | Orientation Program | Excellence in Technical Education and Research | 07.06.08 & 08.06.08 | Anna University, Coimbatore. |
| 7 | Workshop | TCAD and IC CAD Technology and FPGA Using Silvaco and Tanner Tools | 20.09.08 | Muthayammal Engg. College, Rasipuram |
| 8 | Workshop | Advanced Electrical Machines & DSP Processors | 06.12.08 | MET'S School of Engg, Kerala. |
| 9 | Workshop | Environmental Management | 26.06.09 | NITTTR,Tharamani, Chennai |
| 10 | Workshop | Recent trends in Digital and Embedded Control of Power Converter and Drives | 17.09.09 To 19.09.09 | Mepco Schlenk Engg Colleg, Sivakasi |
| 11 | Technical Forum | Educator's day 2010 | 14.12.10 | National Instruments, Chennai |
| 12 | AICTE Sponsored SDP | Soft Computing techniques in Advanced Special Electrical Drives | 13.06.11 To 25.06.11 | Muthayammal Engg. College, Rasipuram |
| 13 | Workshop | Team Building and Leadership | 21.01.12 | Kumaraguru College of Tech., Coimbatore |
| 14 | Workshop | High Impact Teaching skills, Dale Carnegie Training | 27.02.12 & 28.02.12 | Muthayammal Engg. College, Rasipuram, by Wipro Mission10X |
| 15 | Workshop | Mission 10X workshop | 27.02.12 To 02.03.12 | Muthayammal Engg. College by Wipro Mission 10X |

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| 16 | AICTE Sponsored SDP | Multi-Objective optimization techniques for manufacturing processes | 16.04.12 To 28.04.12 | Muthayammal Engg. College, Rasipursm |
| 17 | AICTE Sponsored Seminar | MEMS/Nano Technology Integration for Bio-Medical Application | 24.05.12 & 25.05.12 | Muthayammal Engg. College, Rasipursm |
| 18 | Training Programme | Instructional Design and Delivery System | 29.07.13 To 02.08.13 | NITTTR, Tharamani, Chennai with Muthayammal Engg. College, Rasipursm |

**List of Guest lecture / Workshop / Seminar Delivered
(As a resource person)**

| S.No | Name of the Programme | Title | Date | Organized by |
|------|--------------------------------------|--|------------|--|
| 1. | Seminar | Embedded Systems | 03.01.09 | Murugesan Polytechnic College, Salem |
| 2. | Guest Lecturer | Applications of Embedded Systems | 08.04.10 | Er. Perumal Manimekalai College Of Engg, Hosur |
| 3. | Seminar | Embedded system Basics and Applications | 03.02.2010 | Muthayammal Engg. College, Rasipursm |
| 4. | Workshop | Power Electronics Drives and Control | 19.03.11 | Muthayammal Engg. College, Rasipursm |
| 5. | AICTE Sponsored SDP | Soft Computing Technique in Advanced Special Electrical Drives | 25.06.11 | Muthayammal Engg. College, Rasipursm |
| 6. | Workshop | MATLAB Applications in Power Electronics | 24.09.11 | AVS Engineering College, Salem. |
| 7. | National Level Tech. Symposium | Keynote Address on Embedded Systems | 28.03.12 | PGP College of Engg and Tech., Namakkal. |

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| 8. | Guest Lecture | Applications of Embedded Systems | 17.08.12 | Meenakshi Polytechnic College, Dharmapuri. |
| 9. | Guest Lecture | Recent trends in Electrical Engineering | 13.09.12 | Ganesh College of Engg, Salem. |
| 10. | Workshop | Hands on training in MATLAB Toolboxes | 21.09.12 | Excel College of Engg and Technology, Namakkal. |
| 11. | Value Added Course | Applications of Power Electronic Converters and Controllers | 20.06.13 To 24.06.13 | Muthayammal Engg. College, Rasipursm |
| 12. | Faculty Development Programme | Implementation of Intelligent controllers in MATLAB | 24.08.13 | Govt. College of Engg., Bargur. |
| 13. | Workshop | Modeling and simulation of Power Electronics Converters | 01.10.13 | Tagore Institute of Engg. and Technology, Attur. |
| 14. | Faculty Development Programme | R & D In Power Electronics | 14.11.13 | Govt. College of Engg., Bargur . |
| 15. | Value Added Course | Electrical Drives and Control | 28.09.14 | Muthayammal Engg. College, Rasipursm |
| 16. | Inaugural Function of EEE Association | Basic electrical Engineering | 08.10.14 | Idhaya Engineering College for Women, Villupuram |
| 17. | Seminar | Fuzzy Logic and Neural Network Implementation using MATLAB | 30.10.14 | Muthayammal Engg. College, Rasipursm |
| 18. | Seminar | MATLAB Application to Power Electronic Converters | 20.11.14 | Muthayammal Engg. College, Rasipursm |

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| 19. | International Conference (ICEECE-15) Key note Address | Embedded system Technologies | 12.03.15 | Vivekanandha College of Engineering for Women, Namakkal. |
| 20. | Anna University Sponsored Faculty Training Programme | Microprocessor & Microcontroller | 23.05.15 | A.V.S College of Techno;ogy, Salem. |

OTHER INFORMATIONS

- ❖ Received funding of Rs. 50,000/- for “SEMINAR GRANT” from AICTE (F.No.:RIFD/SEM/83/2011-12 dt.30.11.2011)
- ❖ Published Technical Magazine as a Convener “INSTRONICS” by our EIE department 5 issues per year. (Web Link: <http://measurers.yolasite.com/instronics.php>)
- ❖ Question paper setter for various Deemed Universities and Autonomous Engineering colleges
- ❖ Delivered Guest Lectures and workshops in various Engineering colleges and Polytechnic colleges
- ❖ Actively involved in making the department as Centre for Collaborative Research with Anna University, Coimbatore
- ❖ Established Power Electronics lab, Simulation Lab, Special Electrical Machines Lab with the advanced equipment and softwares
- ❖ Governing Council Member of Muthayammal Engineering College
- ❖ Delivered special Lectures in various workshops, AICTE sponsored seminars, SDP and Guest Lecture programmes organized by EEE, ECE and Mechanical Departments of Muthayammal Engineering College
- ❖ Chair person for National Level Technical Symposium, conducted by various colleges
- ❖ Award received from the management of Muthayammal Engineering college for producing 100% result in the subjects

- ❖ Received “**KANNADHASAN AWARD-2013**” by Kaviyarasar Kalai Tamil Sangam, Paramathi-Vellur, for the contribution towards Tamil on 08.12.13.
- ❖ Given speech on “**VETRI NICHAYAM**” in NSS camp of Muthayammal Engineering college was conducted at Pudupalayam and Jedarpalayam
- ❖ Motivated the students to carry out various projects and won prizes in various science and technology exhibitions
- ❖ Published a PPT on Embedded System Basics in slide share website
(Web Link: http://www.slideshare.net/murugan_m1/embedded-system-basics
Total downloads=8,590, Total Views= 1,81,896 as on 07.03.14)
- ❖ Published few lab manuals also in slide share website
- ❖ My name is added in Marquis Who’s Who in Science and Engineering 11th Edition in the year 2011-2012

References

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DECLARATION

I declare that the information given is true and correct to the best of my knowledge.

Place: Nekemte, Oromia, Ethiopia.

Date: 12.01.2016

Dr.M.Muruganandam