# **Faculty Profile**



Name of the Faculty: Dr. V.P. Sakthivel

Designation: Assistant Professor

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Date of Joining: 16.05.2017

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Specialization: Power System

Professional Experience: 15 Years

Research Guidance: 4

#### **Publications:**

- (i) International Journals:
- 1. V.P. Sakthivel and P.D. Sathya, Multi-area Economic Environmental Dispatch Using Multi-Objective Squirrel Search Algorithm, *Evolving Systems (Springer)*, 2021
- 2. B. Shankarlal, P.D. Sathya and V.P. Sakthivel, Computer-aided Detection and Diagnosis of Thyroid Nodules Using Machine and Deep Learning Classification Algorithms, *IETE Journal of Research*, 2021.
- 3. R. Kalyani, P.D. Sathya, V.P. Sakthivel, Medical Image Segmentation Using Exchange Market Algorithm, *Alexandria Engineering Journal (Elsevier)*, Vol. 60, No. 6, pp. 5039-5063, 2021.
- 4. R. Kalyani, P.D. Sathya, V.P. Sakthivel, Multilevel Thresholding for Image Segmentation with Exchange Market Algorithm, *Multimedia Tools and Applications (Springer)*, 2021.
- 5. V.P. Sakthivel and P.D. Sathya, Single and Multi-Area Multi-Fuel Economic Dispatch Using a Fuzzified Squirrel Search Algorithm, *Protection and Control of Modern Power Systems (Springer)*, Vol. 6, Article No. 11, 2021.
- 6. R. Kalyani, P.D. Sathya and V.P. Sakthivel, Image Segmentation with Kapur, Otsu and Minimum Cross Entropy Based Multilevel Thresholding Aided with Cuckoo Search Algorithm, *IOP Conference Series: Materials Science and Engineering*, Vol. 1119, Article No. 012019, 2021.
- 7. Kanimozhi Rajasekaran, P.D. Sathya and V.P. Sakthivel, Application of Krill Herd Algorithm to Improved Quasi Lossless Fractal Image Compression, *International Journal of Future Generation Communication and Networking*, Vol. 14, No. 1, pp. 249-260, 2021.
- 8. Kanimozhi Rajasekaran, P.D. Sathya and V.P. Sakthivel, Application of Krill Herd Algorithm to Improved Quasi Lossless Fractal Medical Image Compression, *International Journal of Future Generation Communication and Networking*, Vol. 14, No. 1, pp. 224-236, 2021.
- 9. P.D. Sathya, R. Kalyani and V.P. Sakthivel Color Image Segmentation Using Kapur, Otsu and Minimum Cross Entropy Functions Based on Exchange Market Algorithm, *Expert Systems with Applications*, *Elsevier*, Vol. 172, Article No.

- 114636, 2021.
- 10.V.P. Sakthivel, M. Suman and P.D. Sathya, Combined Economic and Emission Power Dispatch Problems Through Multi-Objective Squirrel Search Algorithm, *Applied Soft Computing*, *Elsevier*, Vol. 300, No. 3, Article No. 106950, 2021.
- 11.V.P. Sakthivel and P.D. Sathya, Fuzzified Coulomb's and Franklin's Laws Behaved Optimization for Economic Dispatch in Multi-Area Multi-Fuel Power System, *SN Applied Sciences (Springer)*, Vol. 3, No. 1, Article No. 87, 2021.
- 12. V.P. Sakthivel, H. H. Goh, S. Subramanian, P.D. Sathya and S. K. A. Rahim, Multi-objective Squirrel Search Algorithm for Multi-Area Economic Environmental Dispatch with Multiple Fuels and Valve Point Effects, *IEEE Access*, Vol. 9, No. 1, pp. 3988-4077, 2021.
- 13.V.P. Sakthivel and P.D. Sathya, Squirrel Search Optimization for Non-Convex Multi-Area Economic Dispatch, *International Journal of Engineering, Transactions A: Basics*, Vol. 34, No. 1, pp. 120-127, 2021.
- 14. Kanimozhi Rajasekaran, P.D. Sathya and V.P. Sakthivel, Quasi-Lossless Based Fractal Image Compression Using Krill Herd Algorithm, *International Journal of Advanced Trends in Computer Science and Engineering*, Vol. 9, No. 5, pp. 7763-7769, 2020.
- 15. Kanimozhi Rajasekaran, P.D. Sathya and V.P. Sakthivel, Standard Fractal Medical Image Compression with Krill Herd Optimization Algorithm, *Journal of Xidian University*, Vol. 14, No. 12, pp. 531-538, 2020.
- 16.R. Kalyani, P.D. Sathya and V.P. Sakthivel, Trading Strategies for Image Segmentation Using Multilevel Thresholding Aided with Minimum Cross Entropy, *Engineering Science and Technology, an International Journal*, *Elsevier*, Vol. 23, No. 6, pp. 1327-1341, 2020.
- 17.V.P. Sakthivel, M. Suman and P.D. Sathya, Multi-objective Squirrel Search Algorithm to Solve Economic Environmental Power Dispatch Problems, *International Transactions on Electrical Energy Systems*, Vol. 30, No. 12, pp. e12635, 2020.
- 18. V.P. Sakthivel, M. Suman and P.D. Sathya, Squirrel Search Algorithm for Economic Dispatch with Valve-Point Effects and Multiple Fuels, *Energy Sources, Part B: Economics, Planning, and Policy,* Vol. 15, No. 6, pp. 351-382, 2020.

- 19.M. Suman, V.P. Sakthivel and P.D. Sathya (2020), Squirrel Search Optimizer: New Nature Inspired Metaheuristic Strategy for Disparate Economic Dispatch Problems, *International Journal of Intelligent Engineering and Systems*, Vol. 13, No. 5, pp. 111-121, 2020.
- 20.V.P. Sakthivel, M. Suman and P.D. Sathya, Large Scale Economic Load Dispatch Using Squirrel Search Algorithm, *International Journal of Energy Sector Management*, Vol. 14, No. 6, pp. 1351-1380, 2020.
- 21.V.P. Sakthivel, M. Suman and P.D. Sathya, Robust Multi-Area Economic Dispatch Using Coulomb's and Franklin's Laws Based Optimizer, *International Journal of Engineering and Technology Innovation*, Vol. 10, No. 4, pp. 235-251, 2020.
- 22.V.P. Sakthivel, M. Suman and P.D. Sathya, Environmental/Economic Dispatch Problem: Coulomb's and Franklin's Laws Based Optimization Algorithm, *International Review of Electrical Engineering*, Vol. 15, No. 5, pp. 421-430, 2020.
- 23. Murugesan Suman and Vadugapalayam Ponnuvel Sakthivel, Coulomb's and Franklin's Laws Based Optimization for Nonconvex Economic and Emission Dispatch Problems" *International Energy Journal (IEJ)*, Vol. 20, No. 2, pp. 225-232, 2020.
- 24.M. Suman, V.P. Sakthivel and P.D. Sathya, On the Robust Solution to Multi-Fuel Environmental Economic Power Dispatch Problem with Fuzzy Instituted EMF Optimization, *Bioscience Biotechnology Research Communications Special Issue: Recent Trends in Advanced Information and Communication Technology*, Vol. 13, No.2, pp. 98-104, 2020.
- 25.V.P. Sakthivel, M. Suman and P.D. Sathya, Non-convex Economic Dispatch Problem with Valve Loading Effect via Electromagnetic Field Optimization, *Journal of Xidian University*, Vol. 14, No. 4, pp. 2884-2889, 2020.
- 26.V.P. Sakthivel, M. Suman and P.D. Sathya, Nonconvex Economic Environmental Load Dispatch Using Fuzzy Based Squirrel Search Algorithm, *International Journal on Energy Conversion*, Vol. 8, No. 2, pp. 61-70, 2020.
- 27.P. Santhosh Kumar, V.P. Sakthivel, Mandu Raju and P.D. Sathya, "Holistic Review on Brain Tumor Segmentation using Deep Learning", *International Journal of Future Generation Communication and Networking*, Vol.13, No. 1, pp.

- 1081-1091, 2020. ISSN: 2233-7857.
- 28. M. Suman, V.P. Sakthivel and P.D. Sathya, "Coalesced Economic and Emission Dispatch of Tri-fuel Generators in Energy Markets: Multi-Objective Optimization Technique (MO-HOT)", *International Journal of Advanced Science and Technology*, Vol. 29, No. 3, pp. 7773-7787, 2020. ISSN: 2207-6360.
- 29. V.P. Sakthivel, "Optimization of Three-Phase Induction Motor Design Considering Active Power Loss Effect: Application of Bacterial Foraging Algorithm", *Journal of Computational and Theoretical Nanoscience*, Vol. 16, No.4, pp. 1415-1425, 2019. ISSN: 1546-1963.
- 30.Kanimozhi Rajasekaran, P.D. Sathya and V.P. Sakthivel, "Fractal Image Compression with Particle Swarm Optimization and Flower Pollination Algorithm for Medical Image", *Journal of Computational and Theoretical Nanoscience*, Vol. 16, No.4, pp. 1432-1437, 2019. ISSN: 1546-1963.
- 31.V.P. Sakthivel, "Designing an Energy Efficient Induction Motor: Advanced Computational Intelligence Technique", *Current Trends in Information Technology*, Vol. 9, No. 2, pp.5-13, 2019. ISSN: 2249-4707.
- 32.V.P. Sakthivel, "Nature Inspired Heuristic Algorithm for Efficiency Determination of In-Situ Induction Motor", *Journal of Emerging Technologies and Innovative Research*, Vol. 5, No. 3, pp. 1459-1464, 2018. ISSN: 2349-5162.
- 33.M. Suman and V. P. Sakthivel, "Solution to Economic Dispatch Problem using Flower Pollination Algorithm", *International Journal of Pure and Applied Mathematics*, Vol. 118, No. 18, pp. 3827-3832, 2018. ISSN: 1311-8080.
- 34.V.P. Sakthivel, "New Particle Swarm Optimizer with Nature Inspired Dynamic Inertia Weight for Economic Power Dispatch", *Global Journal of Engineering Science and Researches*, Vol. 5, No. 2, pp. 97-104, 2018. ISSN: 2348 8034
- 35.V.P. Sakthivel, "New Starting Method for Three-Phase Cage Induction Motor using Part Winding Arrangement", *Journal of Emerging Technologies and Innovative Research*, Vol. 5, No. 1, pp.1019-1022, 2018. ISSN: 2349-5162.
- 36.V.P. Sakthivel and P.D. Sathya, "Economic Load Dispatch Using Glowworm Swarm Optimization", *International Innovative Research Journal of Engineering and Technology*, Vol. 3, No. 1, pp. 24-31, 2017. ISSN: 2456-1983.
- 37.V.P. Sakthivel, "Comparative Study of Heuristic Optimization Techniques (HOTs) for Energy Efficient Induction

- Motor Design", *International Journal of Research and Analytical Reviews*, Vol. 4, No. 3, pp. 147-155, 2017. ISSN: 2348-1269.
- 38.V.P. Sakthivel, "Intelligent Design Approach for Three-phase Cage Induction Motor Using Glowworm Swarm Optimization Algorithm", *Journal of Emerging Technologies and Innovative Research*, Vol. 4, No. 9, pp.562-568, 2017. ISSN: 2349-5162.
- 39.V.P. Sakthivel, "Versatile Particle Swarm Algorithm to Solve Power System Valve Point Economic Dispatch Problems", *International Journal of Advance and Innovative Research*, Vol. 3, No. 2, pp. 7-16, 2016. ISSN: 2394-7780.
- 40.V.P. Sakthivel and S.V. Vijayasundaram, "Chaotic Particle Swarm Optimization for Congestion Management in an Electricity Market", *International Journal of Scientific and Research Publications*, Vol. 4, No. 6, pp. 1-6, 2014. ISSN: 2250-3153.
- 41.V.P. Sakthivel and S. Subramanian, "Bio-Inspired Optimization Algorithms for Parameter Determination of Three-Phase Induction Motor," *COMPEL: The International Journal for Computation and Mathematics in Electrical and Electronic Engineering*, Vol. 31, No. 2, pp. 528-551, 2012. ISSN: 0332-1649
- 42.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "An Accurate and Economical Approach for Induction Motor Field Efficiency Estimation Using Bacterial Foraging Algorithm," *Measurement: Journal of the International Measurement Confederation, Elsevier*, Vol. 44, No.4, pp. 674-684, 2011. ISSN: 0263-2241
- 43.V.P. Sakthivel and S. Subramanian, "On-Site Efficiency Evaluation of Three-Phase Induction Motor Based on Particle Swarm Optimization," *Energy: The International Journal, Elsevier*, Vol. 36, No. 3, pp. 1713-1720, 2011. ISSN: 0360-5442
- 44.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "A Nonintrusive Efficiency Estimation Method for Energy Auditing and Management of In-Service Induction Motor Using Bacterial Foraging Algorithm," *IET Electric Power Applications*, Vol. 4, No. 8, pp. 579-590, 2010. ISSN: 1751-8660
- 45.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "Artificial Immune System for Parameter Estimation of Induction Motor," *Expert Systems with Applications: An International Journal, Elsevier*, Vol. 37, No. 8, pp. 6109-6115,

- 46.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "Bacterial Foraging Technique Based Parameter Estimation of Induction Motor from Manufacturer Data," *Electric Power Components and Systems*, Vol. 38, No. 6, pp. 657-674, 2010. ISSN: 1532-5016
- 47. Vadugapalayam Ponnuvel Sakthivel, Ramachandran Bhuvaneswari and Srikrishna Subramanian, "Economic Design of Three-Phase Induction Motor by Particle Swarm Optimization," *Journal of Electromagnetic Analysis and Applications*, Vol. 2, No. 5, pp. 301-310, 2010. ISSN: 1942-0749
- 48.V.P. Sakthivel and S. Subramanian, "Determination of Induction Motor Double-Cage Model Parameters Based on Bacterial Foraging Optimization Algorithm," *International Review of Electrical Engineering*, Vol. 5, No. 4, pp.1529-1537, 2010. ISSN: 1827-6679
- 49. V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "Adaptive Particle Swarm Optimization for the Design of Three-Phase Induction Motor Considering the Active Power Loss Effect," *International Journal of Computer and Electrical Engineering*, Vol. 2, No. 4, pp. 627-636, 2010. ISSN: 1793-8198
- 50.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "Design Optimization of Three-Phase Energy Efficient Induction Motor Using Adaptive Bacterial Foraging Algorithm," *COMPEL: The International Journal for Computation and Mathematics in Electrical and Electronic Engineering*, Vol. 29, No. 3, pp. 699-726, 2010. ISSN: 0332-1649
- 51.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "Multi-Objective Parameter Estimation of Induction Motor Using Particle Swarm Optimization," *Engineering Applications of Artificial Intelligence: The International Journal of Intelligent Real-Time Automation, Elsevier*, Vol. 23, No. 3, pp. 302-312, 2010. ISSN: 0952-1976
- 52. V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "An Improved Particle Swarm Optimization for Induction Motor Parameter Determination," *International Journal of Computer Applications*, Vol. 1, No. 2, pp. 71-76, 2010. ISSN: 0975-6286
- 53.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "Immune Algorithm Based Non-Intrusive Efficiency Determination for In-Situ Induction Motor," *Australian Journal of Electrical and Electronic Engineering*, Vol. 7, No. 1,

54.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "Application of Modern Optimization Techniques to the Parameter Estimation of Induction Motor from Manufacturer Data", *International Journal on Electronic and Electrical Engineering*, Vol. 2, No. 2, pp. 46-63, 2009. ISSN: 0974-2174.

### (ii) National Journals:

1. V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "Application of Particle Swarm Optimization Technique to Alternator Design", *The IUP Journal of Electrical & Electronics Engineering* Vol. III, No. 3, pp. 7-28, 2010. ISSN: 0974-1704.

### (iii) International Conferences:

- 1. B. Shankarlal, P.D. Sathya and V.P. Sakthivel, Screening Thyroid Tumor in Ultrasound Thyroid Images using Hidden Markov Model, *IEEE 2021 Third International Conference on Intelligent Communication Technologies and Virtual Mobile Networks (ICICV)*, Tirunelveli, India, pp. 1420-1425, 2021.
- 2. R. Kalyani, P. D. Sathya, V. P. Sakthivel and J. Ravikumar, Teaching Tactics for Color Image Segmentation Using Otsu and Minimum Cross Entropy, *IEEE 2020 International Conference on System, Computation, Automation and Networking (ICSCAN)*, Pondicherry, India, pp. 1-6, 2020.
- 3. V. P. Sakthivel, M. Suman and P. D. Sathya, Multi-objective Economic/Ecological Emissions Power Dispatch Using Fuzzified EMF Heuristic Algorithm, *IEEE 2020 International Conference on System, Computation, Automation and Networking (ICSCAN)*, Pondicherry, India, pp. 1-6, 2020.
- 4. V.P. Sakthivel, M. Suman and P.D. Sathya, "Physics Inspired Metaheuristic Approach for Solving Economic Load Dispatch in Large Scale Power Systems", Proceedings of International Conference on Power Engineering POWER COIN'20, EEE Department, Sona College of Technology, Salem, March 12-13, pp. 1, 2020. ISBN: 978-93-83910-26-7.
- 5. V.P. Sakthivel, M. Suman and P.D. Sathya, "Non-convex Economic Dispatch Problem with Valve Loading Effect via Electromagnetic Field Optimization", Proceedings of International Conference on Advanced Technologies in Power and Robotics Engineering, IconPOWROBO- '20, EEE Department, Arasu Engineering College, Kumbakonam, February

- 20-21, pp. 1, 2020. ISBN: 978-81-944813-4-8.
- 6. V.P. Sakthivel, M. Suman and P.D. Sathya, "Novel EMF Theories Inspired Algorithm for Economic Load Dispatch of Power System", Proceedings of International Conference on Advances and Developments in Electrical and Electronics Engineering (ICADEE 2k20), EEE Department, Karpagam College of Engineering, Coimbatore, February 6-7, pp. 6, 2020. ISBN: 978-93-5396-147-3.
- 7. V.P. Sakthivel, M. Suman, P.D. Sathya and K. Thirumal, "NCELD-GSO: A framework for economic load dispatch problem with valve-point effects", Proceedings of First International Conference on Advanced Technologies in Electrical Engineering (ICATEE-2019), Kamaraj College of Engineering and Technology, Virudhunagar, Madurai Dt., Oct. 4-5, pp. 26, 2019. ISBN: 978-93-89146-81-3
- 8. V.P. Sakthivel, M. Suman and P.D. Sathya, "Squirrel Search Optimizer for Solving Economic Load Dispatch Problem", Proceedings of the 4th International Conference on innovations in Electrical & Electronics Engineering (ICIEEE-2019), EEE Department, Guru Nanak Institutions, Hyderabad, Telangana, July 26-27, pp. 49, 2019.
- 9. V.P. Sakthivel, "Exchange Market Algorithm: Application to the In-field Efficiency Estimation of Three-phase Cage Induction Motor", Proceedings of the Second International Conference on Innovations in electrical, Information and Communication Engineering (ICIEICE'19), Kongunadu College of Engineering and Technology, Tholurpatti Post, Thottiam Taluk, Trichy Dt, Tamil Nadu, Mar. 24-25, 2019.
- 10.V.P. Sakthivel, "Glowworm Swarm Optimization (GSO): A New Algorithm to Solve Economic Load Dispatch", Proceeding of International Conference on Advancement in Science, Engineering, Technology (ICASET'19), MPNMJ Engineering College, Chennimalai, Mar. 16, pp. 222-227, 2019.
- 11.V.P. Sakthivel, "New Heuristic Approach for Solving Non-Convex Economic Load Dispatch", Proceedings of the Second International Conference on NexGen Technologies, Sengunthar College of Engineering, Tiruchengode, Namakkal Dist. Tamilnadu, Mar. 8-9, pp. 1-13, 2019.
- 12.V.P. Sakthivel, "Meta-Heuristic Framework: Exchange Market Algorithm for Economic Load Dispatch of Power System", Proceedings of the International conference on Information Sciences and Renewable Energy Sources (ICISRES-2K19), Selvam College of Technology, Namakkal, Tamilnadu, Mar. 7 -8, pp.115, 2019.

- 13.V.P. Sakthivel, "Novel Design Strategy of Synchronous Generator Design Optimization Using Exchange Market Algorithm", Proceedings of the International Conference on Recent Advances in Engineering and Technologies, Sri Krishna College of Engineering and Technology, Coimbatore, Feb. 8 -9, pp. 952 -957, 2019. ISBN: 978-93-87862-50-0.
- 14.V.P. Sakthivel, "Optimization of Three-Phase Induction Motor Design Considering Active Power Loss Effect: Application of Bacterial Foraging Algorithm", Proceedings of the First International Conference on Innovative Technologies on Electronics, Information and Communication (INTELINC'18), Department of ECE, Annamalai university, Oct. 12 13, pp. 197, 2018. ISBN: 978–8193–5722-2-1.
- 15.R. Kalyani, P.D. Sathya and V.P. Sakthivel, "A Comprehensive Survey on Multi-Level Thresholding on Image Segmentation", Proceedings of the First International Conference on Innovative Technologies on Electronics, Information and Communication (INTELINC'18), Department of ECE, Annamalai university, Oct. 12 13, pp. 6, 2018. ISBN: 978–8193–5722-2-1
- 16.S. Uma, P.D. Sathya and V.P. Sakthivel, "A Detailed Review of Block Based Techniques in Image Copy Move Forgery Detection", Proceedings of the First International Conference on Innovative Technologies on Electronics, Information and Communication (INTELINC'18), Department of ECE, Annamalai university, Oct. 12 13, pp. 26, 2018. ISBN: 978–8193–5722-2-1
- 17. Kanimozhi Rajasekaran, P.D. Sathya and V.P. Sakthivel, "Fractal Image Compression with Particle Swarm Optimization and Flower Pollination Algorithm for Medical Image", Proceedings of the First International Conference on Innovative Technologies on Electronics, Information and Communication (INTELINC'18), Department of ECE, Annamalai university, Oct. 12 13, pp. 50, 2018. ISBN: 978–8193–5722-2-1
- 18.Kanimozhi Rajasekaran, P.D. Sathya and V.P. Sakthivel, "Fractal Image Compression with Particle Swarm Optimization and Flower Pollination Algorithm", Proceedings of the First International Conference on Innovative Technologies on Electronics, Information and Communication (INTELINC'18), Department of ECE, Annamalai university, Oct. 12 13, pp. 44, 2018. ISBN: 978–8193–5722-2-1
- 19.P.D. Sathya and V.P. Sakthivel, "Modified Bacterial Foraging Algorithm Based Multilevel Renyi's Entropy Threshold Selection", Proceedings of 3rd International Conference on Innovations in Electrical and Electronics Engineering (ICIEEE- 2018), Guru Nanak Institute of Technology, Technical Campus, Hyderabad, Aug. 24 25, pp. 303-320, 2018.

ISBN: 978-93-85101-58-8.

- 20.N. Rajesh Kumar, P.D. Sathya and V.P. Sakthivel, "Circuit and Antenna Design Aspects for Ambient RF Energy Harvesting System: Review", Proceedings of 3rd International Conference on Innovations in Electrical and Electronics Engineering (ICIEEE- 2018), Guru Nanak Institute of Technology, Technical Campus, Hyderabad, Aug. 24 25, pp. 292-296, 2018. ISBN: 978-93-85101-58-8.
- 21.Kanimozhi Rajasekaran, P.D. Sathya and V.P. Sakthivel, "An Efficient Optimization Technique for Fractal Image Compression", Proceedings of 3rd International Conference on Innovations in Electrical and Electronics Engineering (ICIEEE- 2018), Guru Nanak Institute of Technology, Technical Campus, Hyderabad, Aug. 24 25, pp. 297-302, 2018. ISBN: 978-93-85101-58-8.
- 22.V.P. Sakthivel, "Multi Objective Design and Optimization of Synchronous Generator using Improved PSO Algorithm", Proceedings of the First International Conference on NexGen Technologies, Sengunthar College of Engineering, Tiruchengode, Namakkal Dist. Tamilnadu, Jan. 5-6, pp. 786 798, 2018. ISBN: 978-93-86171-90-0.
- 23.V.P. Sakthivel, "Experience in Design Optimization of Alternator Using Amended PSO Algorithm", Proceedings of the 10th International Conference on Recent Trends in Engineering Science and Management (ICRTESM-17), Newton's Institute of Science and Technology, Guntur Dist, Andhra Pradesh, Aug. 12-13, pp. 751-763, 2017. ISBN: 978-93-86171-56-6.
- 24. V.P. Sakthivel and S. Subramanian, "Using MPSO Algorithm to Optimize Three-Phase Squirrel Cage Induction Motor Design," Proceedings of the IEEE International conference on Emerging Trends in Electrical and Computer Technology, St. Xavier's Catholic College of Engineering, Nagercoil, Tamilnadu, India, Mar. 23-24, pp. 261-267, 2011. ISBN: 9781424479245
- 25.V.P. Sakthivel and S. Subramanian, "Energy Conservation through Improved Design of Three-Phase Cage Induction Motor Using BFO Algorithm," Proceedings of the IEEE International Conference on Computer, Communication and Electrical Technology, National College of Engineering, Tirunelveli, Tamilnadu, India, Mar. 18-19, pp. 328-333, 2011. ISBN: 9781424493913
- 26.V.P. Sakthivel and S. Subramanian, "Swarm Intelligence Algorithm for Induction Motor Field Efficiency Evaluation," Proceedings of the International Conference on Swarm, Evolutionary and Memetic Computing, SRM University,

- Chennai, India, Lecture Notes in Computer Science (LNCS), Springer, Dec. 17-18, Vol. 6466, pp. 545-558, 2010. ISBN:9783642175633
- 27.V.P. Sakthivel, R. Bhuvaneswari and S. Subramanian, "In-Situ Induction Motor Efficiency Estimation Using Improved Particle Swarm Optimization," Proceedings of the International Conference on Advances in Energy Conversion Technologies, MIT, Manipal, Karnataka, India, Jan. 7-10, pp. 59-63, 2010.
- 28.R. Bhuvaneswari, V.P. Sakthivel, S. Subramanian and G. Thomas Bellarmine, "Hybrid Approach using GA and PSO for Alternator Design" IEEE Southeastcon 2009, Atlanta, GA, USA, 5-8 March 2009. ISBN: 978-1-4244-3976-8.

## (iv) National Conferences:

- 1. V.P. Sakthivel, "Economic Load Dispatch for Smooth Cost Function using Adaptive PSO", Proceedings of National Conference on Emerging Trends in Engineering and Technology (NCETET'19), Nandha College of Technology, Erode, Tamil Nadu, Mar. 16, 2019.
- 2. V.P. Sakthivel, "Chaotic PSO for Economic Load Dispatch Considering the Generator Constraints", Proceedings of National Conference on Emerging Trends in Engineering and Technology (NCETET'19), Nandha College of Technology, Erode, Tamil Nadu, Mar. 16, 2019.
- 3. V.P. Sakthivel, "Designing an Energy Efficient Induction Motor: Advanced Computational Intelligence Technique", Proceedings of Third National Conference on Advances in Computational Intelligence and Instrumentation Technology (ACIIT 2019), Kongu Engineering College, Perundurai-638060, Tamil Nadu, India, Mar. 2, 2019.
- 4. V.P. Sakthivel, "Comparative Study on Heuristic Optimization Techniques (HOTs): In-Situ Induction Motor Efficiency Determination", Proceedings of National Conference on Recent Trends in Electrical Systems (RTES19), Sona College of Technology, Salem -5, Mar. 1, pp. 1. 2019.
- 5. P.D. Sathya and V.P. Sakthivel, 'Multilevel Renyi's Entropy Threshold Selection Based on Bacterial Foraging Algorithm', Proceedings of National Systems Conference on Recent Advancements in System Modeling Applications, Annamalai University, India, pp. 53-65, 2012. ISBN: 9788132210344.

Conferences/Workshops/ Seminar/ Short Term Refresher Courses Attended (Proof to be Enclosed)

- 1. AICTE sponsored Short Term Training Programme on "Future Electrical Energy Requirements of India and Solution Methods" organized by Coimbatore Institute of Technology, Coimbatore from 17th to 30th November 2008.
- 2. AICTE sponsored Short Term Training Programme on "Advanced machines for Electric Propulsion Systems" organized by Arunai Engineering College, Thiruvannamalai from 16th to 29th November 2009.
- 3. AICTE sponsored Short Term Training Programme on "FACTS controller Application in Transmission Line" organized by Adhiparasakthi Engineering College, Melmaruvathur from 12th to 25th June 2013.
- 4. ISTE sponsored Short Term Training Programme on "Cyber Security" organized by Department of Computer Science and Engineering, Faculty of Engineering and Technology, Annamalai University, from 19.11.2018 to 2.12.2018.
- 5. Industrial Training program on "Communication and Networking Technologies organized by BSNL, Rajiv Gandhi Memorial Telecom training Centre (RGMTTC), GST road, Meenambakkam, Chennai, from 01.06.2020 to 19.06.2020.

Membership in professional body: ISTE