



R.M.D. ENGINEERING COLLEGE

(An Autonomous Institution)

R.S.M. NAGAR, KAVARAI PETTAI – 601206.

Department of Electronics and Communication Engineering



Faculty Research Publications (2022-2023)

SCOPUS / WoS Journal Publications

S. No.	Name of the Faculty	Title of the Paper	Name of the Journal	ISSN / Issue / Page No.	Indexed in
1	Dr. K. HelenPrabha Ms. R. Aarthi	Detection of brain tumor size using modified deep learning and multilevel thresholding utilizing modified dragonfly optimization algorithm	Concurrency and Computation practice and Experience	https://doi.org/10.1002/cpe.7016 Vol. 34, Issue 8 ISSN: 1532-0626	SCIE
2	Dr. K. HelenPrabha	An Effective Multimodal Fusion of Ct and MRI Brain Images for Diagnosis of Alzheimer's Disease Using Waveform	PERIODICO di MINERALOGIA	0369-8963/Volume No.91, No.5, 2022/ https://doi.org/10.37896/pd91.5/9153	SCIE
3	Dr. K. Helen Prabha Ms. M. Shakunthala	Enhanced Detection of Cerebral Atherosclerosis Using Hybrid Algorithm of Image Segmentation	Intelligent Automation & Soft Computing	DOI: 10.32604/iasc.2023.025919 Volume 36, Issue 1 ISSN / eISSN: 1079-8587 / 2326-005X	SCIE (WOS)
4	Dr. K. K. Thyagarajan	SF-CNN: Deep Text Classification and Retrieval for Text Documents	Intelligent Automation & Soft Computing	2023, 35(2), pp. 1799-1813 https://doi.org/10.32604/iasc.2023.027429	SCIE Q3
5	Dr. D. Rukmani Devi	Kapur's entropy based honey badger optimization for design of miniaturized frequency selective surface for 5G electromagnetic shielding	Journal of Computational Electronics	https://doi.org/10.1007/s10825-022-01928-3 ISSN / eISSN: 1569-8025 / 1572-8137 Vol. 21, Issue 06	SCIE
6	Dr. D. Rukmani Devi	Computer-Aided Diagnosis of Muscle Mass through Antenna as a Sensor	Journal of Sensors	Volume 2022, Article ID 4465377, 11 pages https://doi.org/10.1155/2022/4465377 ISSN / eISSN: 1687-725X / 1687-7268	SCIE

7	Dr. D. Rukmani devi	Visual Enhancement of Underwater Images Using Transmission Estimation and Multi-Scale Fusion	Computer Systems Science & Engineering	DOI: 10.32604/csse.2023.027187, 2023, Vol.44, No.3, pp. 1897-1910 ISSN / eISSN: 0267-6192	SCI (WOS)
8	Dr. D. Rukmani devi	Haemoglobin Measurement from Eye Anterior Ciliary Arteries through Borescope Camera	Computer Systems Science & Engineering	Vol.44, No.2, pp. 1763-1774, 2023, DOI:10.32604/csse.2023.026260	SCI (WOS)
9	Dr. D. Rukmani Devi	Host-based Detection and Prevention of Black Hole Attacks by AODV-ICCSO Algorithm for Security in MANETs	Ad Hoc & Sensor Wireless Networks	Vol. 55, pp. 45–73 ISSN / eISSN: 1551-9899 / 1552-0633 DOI: 10.32908/ahsw.n.v55.9475	SCIE (WOS)
10	Dr. A. Chilambuchelvan Ms. G. Karthika	Multimodal Hybrid Features in 3D Ear Recognition	Applied Intelligence	Volume 53, 10, pp. 11618–11635 https://doi.org/10.1007/s10489-022-04071-5 ISSN: 0924-669X	SCIE
11	Dr. A. Chilambuchelvan Dr. N. Vini Antony Grace Ms. G. Karthika	Personal Assistive System for Dumb-Blind People using Raspberry Pi and Machine Learning	International Journal of International Early childhood special Education	Volume 14, NO 7 (2022) DOI: 10.9756/INTJECSE/V14I7.68 ISSN: 1308-5581	ESCI
12	Dr. A. Chilambuchelvan	A Supervised Model of Multivariable Control in Quadruple Tank System	Applied Artificial Intelligence	2023, VOL. 37, NO. 1 https://doi.org/10.1080/08839514.2023.2175107	SCIE
13	Dr. A. Bennila Thangammal	Built-In Self Test (BIST)Architecture Simulation for Testing Crosstalk Effects in Array structured through Silicon Vias (TSV)in 3DICs	Journal of Nanoelectronics and Optoelectronics	Vol :18 (2) , Pages : 210-216 ISSN : 1555-130X DOI:10.1166/jno.2023.3388	SCIE
14	Dr.C.Bennila Thangammal	High performance fir filter based on vedic mathematics	International Journal of System Assurance Engineering and Management	Vol. 14, pp. 829-835 https://doi.org/10.1007/s13198-023-01899-z ISSN / eISSN: 0975-6809 / 0976-4348	ESCI
15	Dr. A. Sumaiya Begum	Combining the advantages of AlexNet convolutional deep neural network optimized with anopheles search algorithm-based feature extraction and random forest classifier for COVID-19 classification	Concurrency and Computation practice and Experience	Vol. 34, no. 15, 2022. DOI: 10.1002/cpe.6958. ISSN: 1532-0626	SCIE

16	Dr. A. Sumaiya Begum	A Computer Aided Breast Cancer Detection Using Unit-Linking Pulse Coupled Neural Network & Multiphase Level Set Method,	Journal of Biomaterials and Tissue Engineering	Vol. 12, No. 8, 1497–1504, 2022 ISSN: 2157-9083	SCIE
17	Dr. A. Sumaiya Begum Ms. P. Poonkuzhali Ms. R. Aarthi	Pre-processing Analysis for Brain Neoplasm Detection from MRI using Modified Fuzzy C-means Segmentation	Journal of Population Therapeutics & Clinical Pharmacology	Vol. 30, Issue No. 10 DOI: 10.47750/jptcp.2023.30.10.056, 1710-6222 ISSN / eISSN: 1710-6222	ESCI Q3
18	Dr. C. Shobana Nageswari	Early-Stage Plant Disease Prediction Using Multilayer Convolutional Neural Network Framework	Journal of Algebraic Statistics	Vol.13, No.3, 2022, 233-240 ISSN: 1309-3452	ESCI
19	Dr. C. Shobana Nageswari Dr. N. Vini Antony Grace	Tunicate swarm-based grey wolf algorithm for fetal heart chamber segmentation and classification: a heuristic-based optimal feature selection concept	Journal of Intelligent & Fuzzy Systems	Vol. 44, No. 1, pp. 1029-1041, 2023 DOI: 10.3233/JIFS-221654 ISSN / eISSN: 1064-1246 / 1875-8967	SCI (WOS)
20	Dr. C. Shobana Nageswari Mrs. S. Gayathri Priya Dr. N. Vini Antony Grace	Information Preserving and Edge Smoothing of Fetal Heart Chamber Using SRDCF with Total Variation	Journal of Population Therapeutics & Clinical Pharmacology	Vol. 30, Issue No :13, pp. 136-144 https://doi.org/10.47750/jptcp.2023.30.13.014 ISSN / eISSN: 1710-6222	ESCI Q3
21	Dr. J. Jayaudhaya Dr. N. Padmavathi	Improved Performance Analysis of PV Array Model Using Flower Pollination Algorithm and Gray Wolf Optimization Algorithm	Mathematical Problems in Engineering	Volume 2022, Article ID 5803771, https://doi.org/10.1155/2022/5803771 ISSN: 1024-123X	SCIE
22	Ms. P. Poonkuzhali	Development of Rogers RT/Duroid 5880 Substrate-Based MIMO Antenna Array for Automotive Radar Applications	Advances in Materials Science and Engineering	Volume 2022, Article ID 4319549, https://doi.org/10.1155/2022/4319549 ISSN: 1687-8434	SCIE
23	Dr. N. Vini Antony Grace	An Efficient Signal Processing Algorithm for Detecting Abnormalities in EEG Signal Using CNN	Contrast Media & Molecular Imaging	Volume 2022, Article ID 1502934, 13 pages ISSN: 1555-4309 (Print) ISSN: 1555-4317 (Online) https://doi.org/10.1155/2022/1502934	SCIE
24	Ms. J. Sumithra	Stability Analysis of Cyber Physical Micro Grid with Dynamic Demand Control Considering Time Delays	International Transactions on Electrical Energy Systems	Volume 2022, Article ID 2599385, 13 pages https://doi.org/10.1155/2022/2599385 ISSN / eISSN: 2050-7038	SCIE

25	Mr. B. Jai Ganesh	Cross Layer Design for Combining Adaptive Modulation and Coding with DMMPP Queuing for Wireless Networks	Journal of Computer Science	Vol. 19 No.6, 2023, 786 – 795 10.3844/jcssp.2023.786.795, ISSN:1549-3636	DOI: DOI:10.3844/jcssp.2023.786.795, ISSN:1549-3636	SCOPUS
26	Mr. J. Jagan Babu	Deep learning and machine learning based air pollution prediction model for smart environment design planning	Global Nest Journal	Vol. 25, No 5, pp-11 - 19 https://doi.org/10.30955/gnj.004735 ISSN 1790-7632 / 1108-4006		SCIE Q3
27	Ms. S. Gayathri Priya	An Optimized Deep-Learning-Based Low Power Approximate Multiplier Design	Computer Systems Science & Engineering	Vol. 44, No. 22, 1647-1657. https://doi.org/10.32604/csse.2023.027744 ISSN / eISSN: 0267-6192		SCIE
28	Ms. S. Gayathri Priya	Internet of things enabled smart solid waste management system	Global Nest Journal	https://doi.org/10.30955/gnj.004744 Vol. 25, No 5, pp-98-105 ISSN 1790-7632 / 1108-4006		SCIE Q3
29	Ms. G. Anitha	Sewage and Health Monitoring using IoT	Telematique	Volume 21 Issue 1, 2022 ISSN: 1856-4194		ESCI
30	Ms. G. Anitha	A Survey of Security Issues in IIoT and Fault Identification using Predictive Analysis in Industry 4.0	International Journal of Engineering Trends and Technology	Vol. 70, No. 12 10.14445/22315381/IJETT-V70I12P211 ISSN:2349-0918E-ISSN:2231-5381		SCOPUS
31	Ms. M. Amalaseena Ms. G. Anitha Dr. N. Padmavathi	High Speed Level Synchronous Non-Zeroing Truncated Scalable Adder	Acta Biomedica	Vol. 94; No. 2 (2023); e2023047 ISSN:0392-4203 DOI:10.23750/abm.v94i2.15445		SCOPUS
32	Dr. S. G. Hymlin Rose	Red Lesion Detection using Region based Method and DSFs For Retinopathy Screening	Neuro Quantology	Volume. 20, Issue. 8 Page 6062-6074 doi:10.14704/nq.2022.20.8.NQ44632 ISSN: 1303 5150		SCOPUS
33	Dr. S. G. Hymlin Rose	Cyclostationary Algorithm for Signal Analysis in Cognitive 4G Networks with Spectral Sensing and Resource Allocation	International Journal of Communication Networks and Information Security	e-ISSN: 2073-607X Volume number:14(3) Pages:47-58 DOI: 10.17762/ijcnis.v14i3.5570		SCOPUS
34	Dr. S. G. Hymlin Rose	Development of highly conductive hybrid Ni-biocarbon-based polyvinyl alcohol composites for microwave shielding properties	Journal of Vinyl and Additive Technology	Vol. 29, No. 3, pp. 427-434 DOI: 10.1002/vnl.21985 ISSN:1548-0585		SCIE Q3
35	Ms. M. Ayesha Nasreen	Energy Efficient Two- Stage Capacity Allocation Scheme for WBAN Healthcare Applications	Ad Hoc Networks	https://doi.org/10.1016/j.adhoc.2022.103065 Vol. 140 No. 103065 ISSN / eISSN:		SCIE

				1570-8705 / 1570-8713	
36	Ms. S. Indumathi	Simulation of 3D-Space Vector Modulation for Neutral Point Clamped Inverters	Bulletin of Electrical Engineering and Informatics	Vol. 12, No. 2, pp.719-726, ISSN: 2302-9285, DOI:10.11591/eei.v12i2.4502	SCOPUS
37	Ms. S. Indumathi	Experimental Analysis of the Green 6G Network for Pervasive Communication	European Chemical Bulletin	Vol. 12, pp. 7806-7815 DOI: 10.48047/ecb/2023.12.si4.700 ISSN 2063-5346	SCOPUS
38	Ms. M. Amalaseena	FPGA Implementation of Area and Power Optimized and High-Speed Seizure Detection System using ELM Classification Method	Neuro Quantology	Volume 20, No.12, 2022 DOI:10.14704/NQ.2022.20.12.NQ77135 eISSN:1303-5150 https://www.neuroquantology.com/article.php?id=8466	SCOPUS
39	Ms. M. Amalaseena	An Optimum Apparent-Integrated Virtual Network Embedding Algorithm in Cloud Computing Data Center Network	Journal of Population Therapeutics & Clinical Pharmacology	Vol. 30, No. 15, pp. 334-341, ISSN / eISSN: 1710-6222 DOI: 10.47750/jptcp.2023.30.15.038	ESCI Q3

Conference Publications

S. No	Name of Faculty Member	Title of the Paper	Name of the Journal	ISSN /Issue No/ DOI	Indexed in
1	Dr. K. HelenPrabha	Forest Fire Occurrence using Machine Learning	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2519, Issue 1 https://doi.org/10.1063/5.0122899	SCOPUS
2	Dr. K.K. Thyagarajan	A patient-specific single sensor IoT-based wearable fall prediction and detection system using machine learning	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2519, Issue 1 https://doi.org/10.1063/5.0111774	SCOPUS
3	Dr. K.K. Thyagarajan	An Improved E-Passport System with Secured IOT and Wireless Communication Technology	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2452, 060001 (2022) https://doi.org/10.1063/5.0113191 ISBN: 978-0-7354-4263-4	SCOPUS
4	Dr. K.K. Thyagarajan	Land Use and Land Cover Classification Using Landsat-8 Multispectral Remote Sensing Images and Long Short-Term Memory-Recurrent Neural Network	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2452, 070001 (2022) https://doi.org/10.1063/5.0113197	SCOPUS

5	Dr. D. Rukmani Devi	Differential and common mode offset correction in read out circuits for open loop half bridge capacitive MEMS accelerometers: Theoretical survey	AIP Conference Proceedings	Vol. 2523, 020154 (2023) https://doi.org/10.1063/5.0112367	SCOPUS
6	Dr. C. Shobana Nageswari	Tomato Leaf Disease Detection through Machine Learning based Parallel Convolutional Neural Networks	IEEE Xplore	2023, pp. 192-197 DOI: 10.1109/ICICCS56967.2023.10142517	SCOPUS
7	Dr. J. Jayaudhaya	A Novel Framework in Scheduling Packets for Energy-Efficient Bandwidth Allocation in Wireless Networks	IEEE Xplore	2023, pp. 1311-1316 DOI: 10.1109/ICAAIC56838.2023.10140669	SCOPUS
8	Dr. J. Jayaudhaya	An Adaptive Congestion Control Approach for Enhancing CoAP Performance in IoT Network	IEEE Xplore	2023, pp. 189-194 DOI: 10.1109/ICAAIC56838.2023.10141283	SCOPUS
9	Mr. S. Balasubramani	A safety system for gold mining and gold oring process-Li-Fi technology	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2519, Issue 1 https://doi.org/10.1063/5.0122899	SCOPUS
10	Mr. Balasubramani S Mr. Prabhu V S	Automatic identification of ripening and quality grading of fruits using deep neural networks	AIP Conference Proceedings	International Conference on Smart Grid & Electric Vehicle (ICSGEV 2021) AIP Conf. Proc. 2452, 020001-1–020001-4; https://doi.org/10.1063/5.0114510 Published by AIP Publishing. 978-0-7354-4263-4/\$30.00	SCOPUS
11	Dr. N. Vini Antony Grace	Context Monitoring of Patients using Wireless Network	IEEE Xplore	2023, pp. 1266 – 1271 DOI: 10.1109/ICICT57646.2023.10134482	SCOPUS
12	Dr. J. Sumithra	A Novel Architecture for Efficient Mobile Communication based on Scattered and Diverse Combination using Prioritize and Poatopertaive Soft Modulation	IEEE Xplore	2023, pp. 1503-1508 DOI: 10.1109/ICICCS56967.2023.10142455	SCOPUS
13	Ms. M. Shakunthala	Embedded sensor-based cattle health monitoring system	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2519, Issue 1 https://doi.org/10.1063/5.0122899	SCOPUS
14	Ms. M. Shakunthala	Intelligent Sensor and IoT Based Vehicle Pollution Monitoring System with Alert	IEEE Xplore	10.1109/ICPECTS56089.2022.10046769	SCOPUS
15	Ms. M. Shakunthala	A Novel Architecture for Efficient Mobile Communication based on Scattered and Diverse Combination	IEEE Xplore	2023, pp. 1503-1508 DOI: 10.1109/ICICCS56967.2023.10142455	SCOPUS

using Prioritize and Post Operative Soft Modulation

16	Mr. P. Arul	Intelligent Power Control Models for the IOT Wearable Devices in BAN Networks	IEEE xplore	DOI: 10.1109/IITCEE57236.2023.10090918	SCOPUS
17	Ms. R. Hemalatha	Analyzing the machine learning for diagnosing chronic kidney disease	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2519, Issue 1 https://doi.org/10.1063/5.011061	SCOPUS
18	Ms. R. Hemalatha	Elegant Detection of Human Voice	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2523, Issue 1 https://doi.org/10.1063/5.0110587	SCOPUS
19	Mr. Kumaravel V	A design and implementation of IoT based on earlier recognition and intimation of wild animal's attack on farming lands	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 https://doi.org/10.1063/5.0112047	SCOPUS
20	Mr. D. Bharathi Dhasan	Identification and classification of cassava plant leaf disease using deep learning technique	AIP Conference Proceedings	ISSN:0094-243X E-ISSN:1551-7616 Volume 2519, Issue 1 https://doi.org/10.1063/5.0110238	SCOPUS
21	Mr. Prabhu V S	Hybrid Smart Home based on AI and IoT with Complex Interwoven Activities for Cognitive Health Assessment and Monitoring	IEEE Xplore	DOI: 10.1109/IC3I56241.2022.10072505	SCOPUS
22	Mr. Prabhu V S	Deep Learning Architectures for Accurate Brain Tumor Analysis	IEEE Xplore	DOI: 10.1109/ICCPC55978.2022.10072111	SCOPUS
23	Mr. J. Jagan Babu	Effective Segmentation of Brain Tumors through the GOA Algorithm using Deep Learning	IEEE Xplore	2023, pp. 389-395 DOI: 10.1109/ICAAIC56838.2023.10140273	SCOPUS
24	Mr. J. Jagan Babu	Effective and Secure Task Offloading in IoT Edge Computing through a Multi-feedback Trust Mechanism	IEEE Xplore	2023, pp. 1366-1372 DOI: 10.1109/ICAAIC56838.2023.10140318	SCOPUS
25	Ms. S. Gayathri Priya	Hybrid optimization algorithm to mitigate phishing URL attacks in smart cities	IEEE Xplore	DOI: 10.1109/ICIPTM57143.2023.10118171	SCOPUS
26	Ms. G. Anitha	Robotic Accident Prevention and Alert System for Visually Impaired	IEEE Xplore	2023, pp. 192-197 DOI: 10.1109/ICICCS56967.2023.10142517	SCOPUS

27	Dr. S. G. Hymlin Rose	Autonomous Self Learning Based Training Device for Alzheimer Patients	IEEE Xplore	10.1109/ICONSTEM56934.2023.10142225	SCOPUS
28	Ms. M. Ayeesha Nasreen	An Overview of Q-learning based Energy Efficient Power Allocation in WBAN (Q-EEPA)	IEEE Xplore	10.1109/CISCT55310.2022.10046536	SCOPUS
29	Ms. M. Ayeesha Nasreen	Data Transmission Dielectric Recombination Proving Ground Besides Bilateral Interaction Sites Software Architecture	IEEE Xplore	https://doi.org/10.1109/IC3I56241.2022.10072896	SCOPUS
30	Ms. M. Amalasweena	Neural network-based prognostic model for cerebrovascular accident using CT scans	IEEE xplore	DOI: 10.1109/ICSCDS56580.2023.10104728	SCOPUS