DR. FIROS A

Associate Professor (Level 13A) | Department of Computer Science & Engineering
Rajiv Gandhi University (A Central University), Rono Hills, Doimukh, Arunachal Pradesh – 791112,India

firosabd@gmail.com | firos.a@rgu.ac.in +91-8131903921 | +91-9402212509 ORCID: 0000-0003-4207-713X
SCOPUS ID: 57201896411

PERSONAL INFORMATION

Full Name	FIROS A	**Date of Birth**	12 May 1980
Father's Name	Abdul Salam	**Mother's Name**	Fathima Beevi
Nationality	Indian	**Marital Status**	Married
Permanent Address	Kundoorkonam, Maruthikunnu PO, Navaikulam, Trivandrum, Kerala – 695603		

ACADEMIC QUALIFICATIONS

Degree	Subject	University / Institution	Year
M.Tech.	Computer Science & Engg.	Anna University, Chennai	2007
MBA	Human Resource Management	Tamil Nadu Open University, Chennai	2013
Ph.D.	Computer Science & Engg.	Rajiv Gandhi University (A Central University), Arunachal Pradesh	2020
Ph.D.	Management	North Eastern Regional Institute of Science and Technology (NERIST), Arunachal Pradesh	ONGOING

Ph.D. (CSE) Thesis: "Design and Development of a Semantic-Based Low Bit Rate Speech Coding Framework for Emotional Speech" | Registration: 09 Mar 2016 | Submission: 18 Mar 2019 | Award: 18 Feb 2020

TEACHING & PROFESSIONAL EXPERIENCE

Designation	Institution	Period	Duration	Level
Associate Professor	Dept. of CSE, Rajiv Gandhi University (Central Univ.), Itanagar	Feb 2023 – Feb 2025	2 yrs 0 m	**13A**
Assistant Professor	Dept. of CSE, Rajiv Gandhi University (Central Univ.), Itanagar	Feb 2010 – Feb 2023	13 years	**12**
Lecturer	Dept. of CSE, Vemana Institute of Technology, Bengaluru, Karnataka	Dec 2007 – Feb 2010	2 yrs 1 m	**10**
Junior Programmer (Industry)	Larsen & Toubro (L&T Electrical & Automation), Mysore — ModBus Protocol Design	May 2002 – Feb 2003	9 months 15 d	—

Subjects taught: Introduction to Programming with C, Advanced Operating Systems, Web Technology, Advanced Computer Architecture, Data Science, Web Analysis and Development, Systems and Network Administration, Java Programming, Computer Architecture, Data Analytics with Python.

RESEARCH PUBLICATIONS (SELECTED PAPERS)

A. SCOPUS/SCI/Peer-Reviewed Journal Articles

[1] Few-Shot Transfer for Speech Enhancement Using SEGAN with Stability Guardrails. Archives of Acoustics, Vol. 52, pp. 1–44. DOI: 10.24423/archacoust.2026.4315, 2026. **[First Author / Corresponding Author] [Scopus]**

[2] **Leveraging fuzzy Artificial Intelligence as a technique to find relative desirability in social network**. Advances in Computers (ScienceDirect, Elsevier), Vol. 125, pp. 17–44. DOI: 10.1016/bs.adcom.2025.08.011 [IF: 5–10], 2025. **[Single Author] [Scopus]**

[3] **Biodegradable Biofilms for In-Vitro Propagation of Vegetative Crop Species**. Music in Bayern, Vol. 90(11), pp. 71–83. DOI: 10.15463/gfbm-mib-2025-491, 2025. [Joint Author] **[Scopus]**

[4] **Developing AI-Based Pollution Source Identification Models**. International Journal of Environmental Sciences, Vol. 11, pp. 962–969. DOI: 10.64252/r0104882, 2025. [Joint Author] **[Scopus]**

[5] **Cybersecurity Dynamics and Legal Frameworks: Shaping the Future in North Eastern India**. International Journal of Cultural Studies and Social Sciences, ISSN: 2347-4777, Vol. 20, pp. 1–7, 2024. **[First Author / Corresponding Author] [Scopus]**

[6] **Mechanical, Water Absorption, Efflorescence, Soundness and Morphological Analysis of Hybrid Brick Composites**. Matéria, 2024. [Joint Author] **[Scopus]**

[7] **SARIMA Techniques for Predictive Resource Provisioning in Cloud Environments**. IEEEEXPLORE. DOI: 10.1109/ICCEBS58601.2023.10449163, 2024. [Joint Author] **[Scopus]**

[8] **Anomaly Detection in Firewall Access Control List using Automata Theory**. Science & Technology Journal, Mizoram University, Vol. 12(1), pp. 130–137, 2024. [Joint Author] **[UGC CARE]**

[9] **Geospatial Object Detection in Hyperspectral Imagery Using Spectral-Spatial Networks**. IEEEEXPLORE. DOI: 10.1109/ICCEBS58601.2023.10449075, 2024. [Joint Author] **[Scopus]**

[10] **Enhancing IoT Security with Self-Adaptive Blockchain-Based Intrusion Detection System**. IEEE Xplore. DOI: 10.1109/ICCEBS58601.2023.10449283, 2024. [Joint Author] **[Scopus]**

[11] **DETR-DC5 Approaches for Improved Spatial Object Detection in Satellite Imagery**. IEEE Xplore. DOI: 10.1109/ICCEBS58601.2023.10448599, 2024. [Joint Author] **[Scopus]**

[12] **Modular Deep Learning for Advertisement Image Memorability: Object and Text Bias**. Journal of Integrated Science and Technology, Vol. 12(2), 740, pp. 1–6 [IF: 1–2], 2023. **[First Author / Corresponding Author] [Scopus]**

[13] **Fault Detection in Power Transmission Lines Using AI Model**. IEEE Xplore (ICICACS). DOI: 10.1109/ICICACS57338.2023.10100005, 2023. **[First Author / Corresponding Author] [Scopus]**

[14] **A Detailed Review of Security System Design for ML-Based Software Systems**. IEEE Xplore (ICACITE). DOI: 10.1109/ICACITE57410.2023.10182814, 2023. [Joint Author] **[Scopus]**

[15] **Machine Learning Integration in Communication System for Efficient Signal Selection**. IEEE Xplore (ICACITE). DOI: 10.1109/ICACITE57410.2023.10182417, 2023. [Joint Author] **[Scopus]**

[16] **NELUMBO NUCIFERA Leaves Extract Partially Reduces High-Fat Diet Induced Obesity**. Journal of Population Therapeutics and Clinical Pharmacology, Vol. 30(1), pp. 423–434, 2023. [Joint Author] **[Scopus]**

[17] **Effect of Environmental Factors on Dynamic Viscosity of Zirconia and Silica Nanofluids**. NanoWorld Journal, Vol. 9(S3): S32, pp. 324–331. DOI: 10.17756/nwj.2023-s3-060, 2023. **[First Author / Corresponding Author] [Scopus]**

[18] **Integration of DL on Multi-Carrier Non-Orthogonal Multiple Access System with SWIPT**. IEEE Xplore. DOI: 10.1109/SMART55829.2022.10046773, 2023. [Joint Author] **[Scopus]**

[19] **Parameterized Fuzzy Measures Decision Making Model for Path Loss in Wireless Communication**. NeuroQuantology, Vol. 20(5), pp. 3647–3651. DOI: 10.14704/nq.2022.20.5.NQ22662, 2022. **[First Author / Corresponding Author] [Scopus]**

[20] **Intuitionistic Fuzzy Hamacher Generalized Shapley Choquet Integral Operators for Material Classification**. Advances in Materials Science and Engineering, ISSN: 1687-8442. DOI: 10.1155/2022/2890996 [IF: 2–5], 2022. **[First Author / Corresponding Author] [Scopus]**

[21] **Investigation of Mechanical Behavior of AA7075/SiC/B4C-Based Aluminium Hybrid Composites**. Advances in Materials Science and Engineering. DOI: 10.1155/2022/2411848 [IF: 2–5], 2022. [Joint Author] **[Scopus]**

[22] **Knots and Knot-Hyperpaths in Hypergraphs**. Mathematics, ISSN: 2227-7390, Vol. 10(3). DOI: 10.3390/math10030424 [IF: 2–5], 2022. [Joint Author] **[Scopus]**

[23] **Empirical Analysis for Improving Food Quality Using AI for Healthcare Sector**. Journal of Food Quality, ISSN: 1745-4557. DOI: 10.1155/2022/1447326 [IF: 2–5], 2022. [Joint Author] **[Scopus]**

[24] **Evaluation of Cluster Approach for Detecting Black Hole Attacks Using Deep Learning**. IEEE Xplore (ICACITE). DOI: 10.1109/ICACITE53722.2022.9823760, 2022. [Joint Author] **[Scopus]**

[25] **Intelligent Fake Node Identification on WSN to Avoid Security Threats using Enhanced AODV**. AIP Conference Proceedings. DOI: 10.1063/5.0089611, 2022. [Joint Author] **[Scopus]**

[26] **On Bipolar Fuzzy Sub semi-modules with Bipolar Fuzzy Connectives**. Journal of Advanced Research in Dynamical & Control Systems, Vol. 12, pp. 35–45, 2020. [Joint Author] **[Scopus]**

[27] **An Approach Towards Rank and Nullity of Algebraic Expressions of Graphs**. Journal of Advanced Research in Dynamical & Control Systems, Vol. 12, pp. 14–23, 2020. [Joint Author] **[Scopus]**

[28] **A Survey on Plant Disease Detection Methods for Building a Robust Detection System**. Soft Computing for Intelligent Systems, Springer, pp. 195–209. DOI: 10.1007/978-981-16-1048-6_15, 2021. **[First Author / Corresponding Author] [Scopus]**

[29] IoT Based Data Collection and Data Analytics Decision Making for Precision Farming. Internet of Things and Machine Learning in Agriculture, pp. 13–28. DOI: 10.52305/MTXX5116, 2021. **[Single Author] [Scopus]**

[30] Investigation of Key Success Factors for Open Innovation in Indian IT Industry. Turkish Journal of Computer and Mathematics Education, Vol. 12, pp. 37–46, 2021. [Joint Author] **[Scopus]**

[31] Efficient Healthcare Cloud Storage Using Fog Prioritization based on Edge Devices. Turkish Journal of Computer and Mathematics Education, Vol. 12, pp. 1059–1066, 2021. [Joint Author] **[Scopus]**

[32] Loss Reduced Network Using Sensorless BLDC Motor. IEEE Xplore. DOI: 10.1109/ICICCS51141.2021.9432139, 2021. [Joint Author] **[Scopus]**

[33] Unmanned Six-Wheels Bogie Rover with Robotic Arm for Surveillance. Turkish Journal of Computer and Mathematics Education, Vol. 12, pp. 2066–2075, 2021. [Joint Author] **[Scopus]**

[34] Estimation of X/γ-ray Shielding Properties using Monte Carlo Simulation. Turkish Journal of Computer and Mathematics Education, Vol. 12, pp. 1117–1122, 2021. [Joint Author] **[Scopus]**

[35] Online Survey: Impact of Covid-19 in College Education. Turkish Online Journal of Qualitative Inquiry, Vol. 12, pp. 542–549, 2021. [Joint Author] **[Scopus]**

[36] Class Consciousness and Socio-Economical Conflict: Katherine Mansfield's 'The Doll's House'. Turkish Journal of Computer and Mathematics Education, Vol. 12, pp. 1135–1139, 2021. [Joint Author] **[Scopus]**

[37] Space Vector PWM Based Matrix Converter with WECS Using DFIG. International Journal of Aquatic Science, Vol. 2, pp. 2404–2414, 2021. **[First Author / Corresponding Author] [Scopus]**

[38] Permanent Magnet Synchronous Generator Based Wind Energy Conversion System. International Journal of Aquatic Science, Vol. 12, pp. 2372–2382, 2021. **[First Author / Corresponding Author] [Scopus]**

[39] Numerical Analysis of the Impact of Magnetohydrodynamics on Steady Boundary Layer Slip Flow. Turkish Online Journal of Qualitative Inquiry, Vol. 12, pp. 580–590, 2020. [Joint Author] **[Scopus]**

[40] Semantic Level Emotional Voice Coding Using Feed Forward ANN. International Journal of Management Technology and Engineering, Vol. 9, pp. 3380–3386, 2019. **[First Author / Corresponding Author] [Scopus]**

[41] A Study on Antibiotic Susceptibility Pattern of Staphylococcus Aureus from Acne. Journal of Herbal Science, ISSN: 2278-2257, Vol. 8(1), pp. 21–31, 2019. [Joint Author] **[Scopus]**

[42] Impact of Semantic Coding of Emotional Speech on Coding Performance. International Journal of Computer Trends and Technology, Vol. 57(1), pp. 6–10, 2018. **[First Author / Corresponding Author] [Scopus]**

[43] A Low Bit Rate Speech Coding and Synthesis Based on Hidden Markov Models. IJRECE, Vol. 6, pp. 53–59, 2018. **[First Author / Corresponding Author] [Scopus]**

[44] Intelligible Semantic Level Speech Compression Preserving Emotional Content. IEEE Xplore (ICECDS). DOI: 10.1109/ICECDS.2017.8390013, 2017. **[First Author / Corresponding Author] [Scopus]**

[45] Semantic Speech Coding Using Fuzzy K-Mean Clustering. International Journal of Innovations & Advancement in Computer Science, Vol. 6, pp. 178–181, 2017. **[First Author / Corresponding Author] [Scopus]**

[46] Text Independent Gender Identification in Noisy Environmental Conditions. IEEE Xplore (CCAA). DOI: 10.1109/CCAA.2017.8229772, 2017. **[First Author / Corresponding Author] [Scopus]**

[47] Efficient Distribution of Virtual Machines Using Honey Bee Windowing in Cloud Computing. IEEE Xplore (CCAA). DOI: 10.1109/CCAA.2017.8229996, 2017. **[First Author / Corresponding Author] [Scopus]**

[48] A Novel Speaker Identification System Using Feed Forward Neural Networks. IEEE Xplore (ICECDS). DOI: 10.1109/ICECDS.2017.8390014, 2017. **[First Author / Corresponding Author] [Scopus]**

[49] Semantic Based Emotional Voice Coding Using Feed Forward ANN. Aegaeum, Vol. 3, pp. 53–59, 2015. **[First Author / Corresponding Author] [Scopus]**

[50] Acoustic Representation of Adi Vowels. International Journal of Computer Science (IJCSI), Vol. 10(2), pp. 519–522, 2013. [Joint Author] **[Scopus]**

[51] A Wearable Medicines Recognition System Using Deep Learning for Visually Impaired. IJFANS, Vol. 11(1), pp. 2340–2348, 2022. [Joint Author] **[Scopus]**

[52] Machine Learning Application for Medicine Distribution Management System. IJFANS, Vol. 11(1), pp. 2323–2330, 2022. [Joint Author] **[Scopus]**

[53] Novel AI and IoT Approach for Preventing COVID-19 Pandemic During Emergency. IJFANS, Vol. 11(8), pp. 432–441, 2022. [Joint Author] **[Scopus]**

[54] Twofold Route Selection AODV Routing Protocol Based on Multiple Metrics for MANET & DL. IJFANS, Vol. 11(8), pp. 424–431, 2022. [Joint Author] **[Scopus]**

[55] Fuzzy Logic Implementation of IoT and Smart Material Management in Automotive. IJFANS, Vol. 11(1), pp. 404–414, 2022. [Joint Author] **[Scopus]**

[56] IoT Based Novel Approach for Design and Production Systems in Industry 4.0. IJFANS, Vol. 11(8), pp. 452–460, 2022. [Joint Author] **[Scopus]**

[57] Integration of IoT and Cloud Computing for WSN in Healthcare and Agriculture. IJFANS, Vol. 11(8), pp. 442–451, 2022. [Joint Author] **[Scopus]**

[58] IoT and ML Based Effective Plant Disease Classification for Agricultural Applications. IJFANS, Vol. 11(1), pp. 415–423, 2021. [Joint Author] **[Scopus]**

[59] A Novel AI and IoT Approach for Social Distancing in COVID-19. IJFANS, 2022. [Joint Author] **[Scopus]**

BOOKS & BOOK CHAPTERS

A. Books Authored (8 Books)

[1] Office Automation Tools: A Guide. Book Authored. Publisher: Sushant Sathish. Year: 2023. ISBN: 979-8891860322. [National]

[2] Python Data Analytics: A Machine Learning Approach. Book Authored. Publisher: Sushant Sathish. Year: 2022. ISBN: 979-8888331453. [National]

[3] Data Analytics with Python: Lecture Notes and Laboratory Manual. Book Authored. Publisher: Iulia Liszczynska. Year: 2021. ISBN: 978-1636485959. [International]

[4] Tracing Attackers with Trust-Based Deterministic Packet Marking: A Hacker's Guide. Book Authored. Publisher: Wajidha Noorally. Year: 2020. ISBN: 978-6138945765. [International]

[5] Fundamentals of Natural Language Processing — Lecture Notes. Book Authored. Publisher: Sushant Sathish. Year: 2020. ISBN: 978-1639049738. [National]

[6] e-Enabled Performance Management System for Officers: An Officer's Guide. Book Authored. Publisher: Emily Jenkins. Year: 2020. ISBN: 978-6138946380. [International]

[7] Systems and Network Administration (SNA): A Handbook for Beginners. Book Authored. Publisher: Sushant Sathish. Year: 2020. ISBN: 978-1639041480. [National]

[8] Understanding Discrete-time Signal Processing: Lecture Notes. Book Authored. Publisher: Sushant Sathish. Year: 2020. ISBN: 978-1639200191. [National]

B. Chapters in Edited Books (43 Chapters — Selected)

[1] Fuzzy AI-Driven Intelligent Agents for Intrusion Detection in WSN. Chapter (First/Corresponding). Publisher: Bhattacharyya, Kundu, et al. (Eds.). Year: 2026. ISBN: 978-1-041-11274-7. [International]

[2] Fuzzy AI for Smart Decision-Making in Supply Chain Management: Industry 5.0. Chapter (First/Corresponding). Publisher: Tarnanidis et al. (Eds.). Year: 2026. ISBN: 979-8-3373-2111-0. [International]

[3] AI-Driven Fuzzy Logic System for Consumer Behavior Analysis in Metaverse. Chapter (First/Corresponding). Publisher: Saini, Rani, Puri, Jhanjhi (Eds.). Year: 2026. ISBN: 978-1-032-99697-4. [International]

[4] Blockchain-Enabled Cybersecure IoT Framework Powered by Fuzzy AI. Chapter (First/Corresponding). Publisher: Challa (Ed.). Year: 2026. ISBN: 978-3-032-18870-0. [International]

[5] Application of Fuzzy AI as Technique to Find Relative Desirability of Earthquake. Chapter (First/Corresponding). Publisher: Pandey, Rai, Alam (Eds.). Year: 2025. ISBN: 979-8-89881-138-9. [International]

[6] Preference-Leveled Evaluation Functions in Fuzzy AI for Cell Abnormalities in Healthcare IoT. Chapter (First/Corresponding). Publisher: Bhattacharyya et al. (Eds.). Year: 2025. ISBN: 978-1-032-90007-0. [International]

[7] Fuzzy Artificial Intelligence for Automated Insurance Premium Assignment. Chapter (First/Corresponding). Publisher: Trivedi, Nallakaruppan, Balusamy, Sivakumar (Eds.). Year: 2025. ISBN: 978-1-032-75133-7. [International]

[8] Enhancing Supply Chain Management in Industry 5.0 With Fuzzy AI. Chapter (First/Corresponding). Publisher: Aqil, Said, Lahby (Eds.). Year: 2025. ISBN: 979-8-337-33136-2. [International]

[9] A Model for Understanding Emotion in Online Learning Using Fuzzy Logic. Chapter (Single Author). Publisher: Dutta, Gupta, Kashyap et al. (Eds.). Year: 2025. ISBN: 978-1-032-70369-5. [International]

[10] Fuzzy AI for Evaluating Relative Desirability in Autonomous Vehicle Navigation. Chapter (First/Corresponding). Publisher: Khalid (Ed.). Year: 2025. ISBN: 979-8-369-35797-2. [International]

[11] Ethical Considerations in Fuzzy AI for Detecting Fake Reviews. Chapter (First/Corresponding). Publisher: Bhattacharya (Ed.). Year: 2024. ISBN: 979-8-369-34147-6. [International]

[12] Fuzzy Logic & Bio-Inspired Ant Colony for Relative Desirability in Healthcare IoT. Chapter (Single Author). Publisher: Kumar, Saini, Dubey, García Díaz (Eds.). Year: 2024. ISBN: 978-1-032-64063-1. [International]

[13] IoT Based Automated Decision Making with Data Analytics in Agriculture. Chapter (Single Author). Publisher: Sathish (Ed.). Year: 2024. ISBN: 978-981-517-951-4. [International]

[14] AI Generative Models for the Fashion Industry. Chapter (First/Corresponding). Publisher: Kumar (Ed.). Year: 2024. ISBN: 979-8-369-33278-8. [International]

[15] Parameterized Fuzzy Measures Decision Making Model Based on Preference Leveled Evaluation. Chapter (First/Corresponding). Publisher: Chaudhary, Alam (Eds.). Year: 2022. ISBN: 978-1-032-31044-2. [International]

[16] Wireless Rural Kiosk Machine based 5G Solution for Education in Rural India. Chapter (Single Author). Publisher: Neduncheliyan (Ed.). Year: 2022. ISBN: 978-93-5627-353-5. [National]

[17] Knots and Knot-Hyperpaths in Hypergraphs. Chapter (Single Author). Publisher: Cristea (Ed.). Year: 2023. ISBN: 978-3-0365-8440-9. [International]

[18] Semantic Based Emotional Voice Coding Using FFNN for Smart Home Devices. Chapter (Single Author). Publisher: Singh, Solanki (Eds.). Year: 2024. ISBN: 978-1-003-48018-1. [International]

[19] How Compressed Is Your Speech. Chapter (Single Author). Publisher: Rahman (Ed.). Year: 2016. ISBN: 978-93-83252-62-6. [National]

(+ 24 additional book chapters in international edited volumes, 2021–2025)

PATENTS (10 AWARDED)

#	Patent Title	Reference No.	Scope	Status
1	Fingerprint Analysis Device with Integrated Digital Microscope	6356755	International	Awarded
2	An IoT Based Real Time Surveillance Device	6367026	International	Awarded
3	AI and ML Based Smart Drone for Emergency Medical Delivery	417128	National	Awarded
4	IoT Based Management and Prediction of Currency Flow through UPI Transaction	1196409	International	Awarded
5	AI and Voice Based Patients Monitoring System	202041048080 A	National	Awarded
6	AI-Based Computer Device for Access Control	6475443	International	Awarded
7	AI-Based Breast Cancer Detection Device	6370002	International	Awarded
8	AI-Based Image Recognition Computer Device for Autonomous Vehicle	6475033	International	Awarded
9	An Industrial Device for Pallet Wrapping	354210-001	National	Awarded
10	IoT Enabled Chemical Mixing Device for Agriculture Farm	410327-001	International	Awarded

RESEARCH GUIDANCE

Category	Submitted	Awarded
Ph.D. — Sole Supervision	1	1
M.Tech./MCA Dissertation — Sole Supervision	—	36

Additionally guided 4 ongoing Ph.D. scholars, 10+ M.Tech. students, 10+ MCA students, and 20+ BCA students in research projects.

RESEARCH PROJECTS & SPONSORED ACTIVITIES

Project Title	Funding Agency	Role	Grant	Status
Grant for AICTE Short Term Training Program on Big Data Analytics (3 Phases)	AICTE, New Delhi	Sole PI	< 10 Lakhs	Completed
Community Radio Service Station — RGUFM 91.2 MHz (establishment)	Rajiv Gandhi University	Sole PI	> 10 Lakhs	Completed
Incubation Centre — Atal Community Innovation Centre (ACIC) by Atal Innovation Mission	Atal Innovation Mission	Co-PI	> 10 Lakhs	Ongoing

CURRICULUM DESIGN & ICT CONTRIBUTIONS

1. BCA-CC-361: Systems and Network Administration — Rajiv Gandhi University (UG), 2021
2. PHDCS841: Data Analytics with Python — RGU Ph.D. Coursework, 2020
3. ANIM44: Web Technology — Bachelor in Vocational Studies Animation & VFX, RGU, 2019
4. MCAE-641: Advanced Computer Architecture — MCA Syllabus, RGU, 2015

5. MCA Elective: Data Mining — RGU (PG), 2015

CONFERENCE / SEMINAR PRESENTATIONS & INVITED LECTURES (51 TOTAL)

A. Invited Lectures

[1] Fuzzy System Models for Computing. Technology Conclave-2026, DST-TEC, Rajiv Gandhi University, 2026. **[Invited Lecture]**

[2] Modern Mathematical Models for Computing. International Conference on Recent Trends in Mathematics and Computing, Jamia Millia Islamia, New Delhi, 2026. **[Invited Lecture]**

[3] Data Science and Beyond. National Conference on Recent Trends in IT, Rajiv Gandhi University, 2015. [Resource Person]

[4] Fundamentals of Data Science and Analytics. AICTE-STTP on Big Data Analytics Using Soft Computing Tools (Phase I), RGU, 2021. [Resource Person]

[5] Application of Big Data Analytics — Smart Grid to FinTech. AICTE-STTP Big Data Analytics (Phase II), RGU, 2021. [Resource Person]

[6] Data Science Vs Fake News. AICTE-STTP Big Data Analytics with AI & ML (Phase III), RGU, 2021. [Resource Person]

[7] Gender Sensitization. Nazareth College of Arts and Science, Avadi, Chennai, 2021. [Resource Person]

[8] R Basics. National Workshop on R Programming, Dept. of Economics, Jamia Millia Islamia, New Delhi, 2022. [Resource Person]

[9] Fuzzy based Decision Making Systems. Winter School on AI-ML & Learning Technologies-2025, DST-TEC, Rajiv Gandhi University, 2025. **[Invited Lecture]**

B. Paper Presentations (Selected — International)

[1] Hybrid Feature Selection Using Random Forest with DenseNet121 for Pneumonia Detection. 2025 IEEE Asia Meeting on Environment and Electrical Engineering, Hanoi, Vietnam, 2025. [Paper Presented]

[2] Preference-Levelled Fuzzy AI for Evaluating Desirability in Smart Healthcare. 2025 IEEE Asia Meeting on Environment and Electrical Engineering, Hanoi, Vietnam, 2025. [Paper Presented]

[3] A Hybrid Deep Learning Framework for Text-Based Emotion Detection. 7th DoSCI-2026, IET Lucknow, Univ. of Delhi & Univ. of Calabria, Italy, 2026. [Paper Presented]

[4] Intelligible Semantic Level Speech Compression Preserving Emotional Content. ICECDS 2017, SKR Engineering College, Tamil Nadu (IEEE), 2017. [Paper Presented]

[5] Text Independent Gender Identification in Noisy Conditions. ICCCA 2017, Galgotias University (IEEE), 2017. [Paper Presented]

[6] Efficient Distribution of Virtual Machines Using Honey Bee Windowing. ICCCA 2017, Galgotias University (IEEE), 2017. [Paper Presented]

[7] A Novel Speaker Identification System Using Feed Forward Neural Networks. ICECDS 2017, SKR Engineering College (IEEE), 2017. [Paper Presented]

[8] A Low Bit Rate Speech Coding Based on Hidden Markov Model. ICNFESMH-2018, Mahratta Chamber of Commerce, Pune, 2018. [Paper Presented]

[9] A Survey on Plant Disease Detection for Building a Robust Detection System. 2nd SCIS-2020, IET-UIET, Kurukshetra University, 2020. [Paper Presented]

[10] Deep Neutral Network Based Gender Classification Framework. ICCTCHIT'20, K.S.R. College of Engineering, Tamil Nadu, 2020. [Paper Presented]

[11] Social Media Chat Behavior Analysis Through Big Data Analytics. SCAC'21, PSNA College of Engineering & Technology, Dindigul, 2021. [Paper Presented]

[12] Improving Healthcare IoT with Fuzzy AI — Preference Leveled Evaluation Functions. 2nd International Conference on VLSI and Microwave Technologies, MMMUT Gorakhpur, 2024. [Paper Presented]

[13] Unmasking Polymorphic Malware and Its Detection Techniques. 4th ICMCTT-IV 2024, Kristu Jyoti College, Kerala, 2024. [Paper Presented]

[14] Hash Based Mechanism for Tracing Multiple Attackers with Deterministic Packet Marking. ICIS-07, DMI College of Engineering, Chennai, 2007. [Paper Presented]

[15] Honey Bee Windowing for Virtual Machine Distribution in Cloud Computing. FISAT International Conference, Ernakulam, Kerala, 2014. [Paper Presented]

(+ 36 additional conference presentations at national and international conferences)

ADMINISTRATIVE & ACADEMIC RESPONSIBILITIES

Role / Committee	Year(s)
Member, IQAC Team, Rajiv Gandhi University	2019 – present
Member, NIRF Team, Rajiv Gandhi University	2017 – present
Member, Advisory Board — Centre for Entrepreneurship, RGU	ongoing

Role / Committee	Year(s)
Expert Member, RGU-ACIC (Atal Community Innovation Centre) Implementation Committee	2019 onwards
Coordinator, Placement Committee (CSE)	2019–2022
Convener, CAS Revaluation Committee	2019
Department (CSE) Coordinator, RGUCET	2018
Head In-charge (ECE Department)	2017
Chairman, Anti-Ragging Squad (CSE)	2016
Chairman, Department Syllabus Review Committee (MCA)	2015
Coordinator, AICTE Application Process Committee	2015–2017
Coordinator, AICTE-Sponsored Activities	2015–2017
Coordinator, Examinations (CSE)	2016
Coordinator, Certificate Course in Office Automation (CCOA)	2015
Convener, MCA Admissions (Departmental Selection Committee)	2015–2017
Convener, M.Tech. Admissions (Departmental Selection Committee)	2018–2019
Member, ICT Capacity Building Committee, RGU	2015
Member, Technical Committee (ICT), RGU	ongoing
Member, Technology of Access, Equity and Quality (TAEQ) Cell	ongoing
Member, Purchase Committee (Scientific Equipment), RGU	2015–2016, 2018–2019
Member, Spot Purchase (Advisory) Committee, RGU	2019
Member, Convocation Committee	2016
Member, Atal Innovation Mission Proposal Submission Committee	ongoing
Technical Committee Member, Online Admission (RGUCET)	ongoing
Member, RGUCET & RGUMPET Conduction Committee	2019
Web Coordinator, Department of CSE, Rajiv Gandhi University	ongoing
Teacher In-charge, Laboratory Committee (CSE)	ongoing
Member, Departmental Library Committee, RGU	ongoing
External Examiner (Practical Examinations), Dept. of ECE, RGU	Dec 2018, May 2019, Dec 2019
Organizer/Organizing Secretary, Conferences and Workshops (CSE)	multiple years

PROFESSIONAL MEMBERSHIPS & OTHER ACTIVITIES

- Member, Institute of Engineers (India) — Membership No. M-1593573 (from October 2017)
- Senior Member, IEEE — Membership No. 101335191
- Reviewer, Indonesian Journal of Electrical Engineering and Computer Science (Scopus Indexed)
- Languages of Instruction: English, Hindi, Malayalam, Tamil
- Mode of Assessment: Self-assessment, Student Feedback, Peer Review, Expert from other departments

PROGRAMMES ORGANISED

1. Apr 29, 2020 May 3, 2020 FDP Five days Faculty development program on Basics of R Programming, jointly organized by IIT Bombay and Department Of Computer Science And Engineering, Rajiv Gandhi University, Doimukh Convener -Organised National
2. Sep 21, 2021 Oct 2, 2021 FDP STTP- Phase I : AICTE sponsored STTP On BIG DATA ANALYTICS USING SOFT COMPUTING TOOLS (FOR DATA ANALYTICS) Convener -Organised National
3. Nov 8, 2021 Nov 13, 2021 FDP STTP- Phase II : AICTE sponsored STTP On BIG DATA ANALYTICS USING SOFT COMPUTING TOOLS (FOR DATA ENGINEERING) Convener -Organised National

4. Nov 29, 2021 Dec 4, 2021 FDP STTP- Phase III : AICTE sponsored STTP On BIG DATA ANALYTICS USING SOFT COMPUTING TOOLS (WITH AI & ML) Convener -Organised National
5. Jun 19, 2020 Jun 19, 2020 Workshops Workshop on Machine learning and Deep learning using MATLAB, jointly organized by Department Of Mathematics and Department Of Computer Science And Engineering, Rajiv Gandhi University, Doimukh and ELMAX SYSTEMS AND SOLUTIONS, MATHWORKS (MATLAB AND SIMULIN Convener -Organised National
6. Oct 27, 2021 Oct 28, 2021 Workshops TWO- DAY ONLINE WORKSHOP ON RESEARCH AND PUBLICATION ETHICS Convener -Organised National
7. Oct 5, 2021 Oct 8, 2021 Workshops Webinar program on “Cyber Week Celebrations “ Convener -Organised National
8. Nov 2, 2022 Nov 2, 2022 Workshops Awareness program on Cyber Security (as a part of the Cyber Jaagrookta Diwas 2022 celebration) Convener -Organised National
9. Nov 15, 2025 Nov 19, 2025 FDP Faculty Development Programme on the theme "Artificial Intelligence & Machine Learning" in association with PANTECH SOLUTIONS INDIA PVT LTD, Chennai Convener -Organised National
10. Mar 06, 2025 Mar 07, 2025 Seminar Two-day Seminar on "Role of computational models in problem solving: health, industry and beyond" Convener -Organised National
11. Aug 07, 2024 Aug 09, 2024 Seminar Three Day Seminar on "Computational Models to Assist in Enhancing Agricultural activities and Productivity" In association with AICTE-VIBRANT ADVOCACY FOR ADVANCEMENT AND NURTURING OF INDIAN LANGUAGES INSTITUTION Convener -Organised National
12. 30th October 2025 31st October 2025 Workshop Two-Day Capacity Building Workshop on Innovation Design & Entrepreneurship Convener -Organised National
13. Sep 2, 2015 Sep 3, 2015 Conference National conference on recent trends in information technology Convener -Organised National

RESEARCH ROADMAP & VISION STATEMENT

My research is focused on Fuzzy AI, Speech Processing, Machine Learning, Computer Vision, IoT Security, and Cybersecurity. I have published 100+ research articles of which 43 are in Scopus-indexed journals and maintained an annual publication growth of 10–25%. I lead a multidisciplinary research group applying decision-making models across Computer Science, Management, and Engineering domains. My current focus includes publishing in SCI-indexed journals, filing new patents, and expanding the RGU-ACIC incubation ecosystem. For the next five years, I plan to strengthen interdisciplinary collaborative research, secure major government-funded projects (DST, SERB, AICTE), enhance Ph.D. supervision output, and contribute to establishing research infrastructure benefiting the North-East India academic community.

DECLARATION

I hereby declare that all the information provided in this Curriculum Vitae is true and correct to the best of my knowledge and belief. All documents and certificates pertaining to the qualifications and experience mentioned above are available for verification upon request.

Place: RGU
Date:27.10.2026

Dr. Firos A Associate Professor (Level 13A) Dept. of Computer Science & Engineering Rajiv Gandhi University, Rono Hills Arunachal Pradesh — 791112