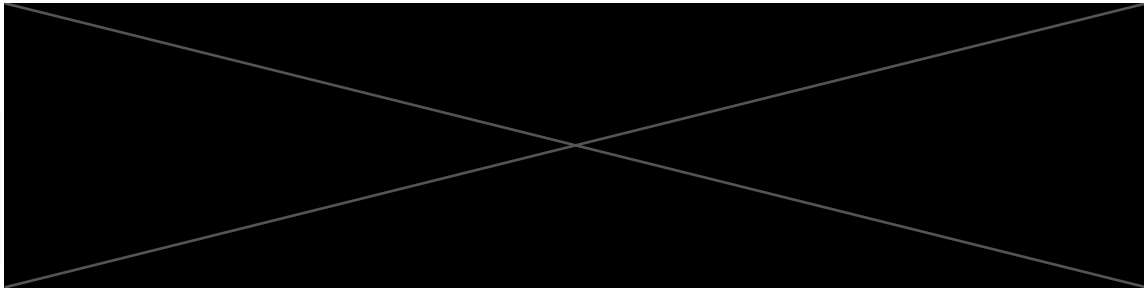# Abu Sufian, Ph.D.

Career Summary:

- Over nine years of research experience in Computing and AI, with 40+ publications in top-tier venues, over 2,000 Google Scholar, and 1,100 Scopus citations.

- 13 years of teaching experience, developing and delivering diverse course materials, supervising 34 M.Sc. students for their projects, and currently mentoring 3 Ph.D. scholars.

- Led the development of new undergraduate and postgraduate curricula, introduced an industry-focused Computer Application Honours program, and contributed to student recruitment as a joint convener of the postgraduate admissions committee.

- Served as an executive committee member of IEEE CIS Kolkata Chapter, technical committee member in major events such as ACVR workshops at ICCV 2023 (Paris) and ECCV 2024 (Milan), FAIRBIO at ICPR 2024, and contributed to editorial tasks for top-tier journals and conferences.

Appointment (Regular Responsibilities):

- **Postdoctoral Researcher**   **(Aug 2014 – Present)**
  National Research Council of Italy - Institute of Applied Sciences and Intelligent Systems (CNR-ISASI), 73100 Lecce, Italy.
  Project: Future Artificial Intelligence Research FAIR CUP B53C220036 30006 grant number PE0000013.
  Funding Amount: 58194952 €.
  CNR Unit Research task: Fundaments of Computer Vision, Pattern Recognition, and Machine Learning for multimodal data analysis in pervasive solutions.

- **Assistant Professor**   **(Feb 2016 – Present)** [on sabbatical since Aug 2024]
  Department of Computer Science, University of Gour Banga (A State University)
  English Bazar, West Bengal-732103, India.

- **Assistant Teacher**   **(July 2011 – Feb 2016)**
  Kanska Rahimia High Madrasah (Higher Secondary)
  Murshidabad, West Bengal- 742302, India.

- **Block Social Audit Coordinator (Junior Progamme Officer)**   **(Nov 2010 – July 2011)**
  MGNREGA Project, Krishnanagar-II Development Block
  Dhubulia, West Bengal- 741139, India.

Appointment (Additional Responsibilities):

- **Convener** **(July 2011 – Feb 2016)**
  Board of Research Studies, Dept. of Computer Science, University of Gour Banga
  English Bazar, West Bengal, India.

- **Joint Convener** **(For the session 2019-20)**
  Post Graduate Admission Committee, University of Gour Banga
  English Bazar, West Bengal, India.

- **Coordinator (Head)** **(Aug 2017 – Aug 2019)**
  Department of Computer Science, University of Gour Banga
  English Bazar, West Bengal, India.

- **Convener** **(Aug 2017 – Aug 2019)**
  Board of Studies, Dept. of Computer Science, University of Gour Banga
  English Bazar, West Bengal, India.

- **Secretary** **(2013 – 2015)**
  Academic Council, Kanska Rahimia High Madrasah (Higher Secondary)
  Murshidabad, West Bengal, India.

Formal Education:

- **Ph.D.** in Computer Science **(July 2017 – June 2022)**
  Visva Bharati (A Central University and an Institute of National Importance)
  Santiniketan, West Bengal, India.

- **Master of Computer Applications (M.C.A.)** **(July 2007 – July 2010)**
  West Bengal University of Technology (MAKAUT)
  Kolkata, West Bengal, India.

- **B.Sc. (Honours)** in Mathematics **(July 2002 – June 2007)**
  University of Kalyani
  Kalyani, West Bengal, India.

Research Expertise:

Foundation and Applied research in the following areas:

- Explainable and Generalizable Deep Learning
- Computer Vision
- Generative AI
- Meta-learning and Few-Shot Learning.
- Media Forensic
- Biometrics

Teaching-learning Experience:

- Mathematics for Computing and Data Science

- Programming (including Object Oriented Programming)

- Programming Languages (C, C++, Java, Python, PyTorch, and TensorFlow)

- Algorithms and Data Structures

- Databases

- Data Science

- Artificial Intelligence and Computational Intelligence

- Machine Learning and Deep Learning

- Cybersecurity (Primarily Media Forensic and Biometric)

Research Output:

- Journal Papers: **22** | Conference Papers: **14** | Book Chapters: **4**

- **Conference Paper:**

  - **Abu Sufian**, Marco Leo, Cosimo Distane, Anirudha Ghosh, and Debaditya Barman **"Can Vision Transformers with ResNet's Global Features Fairly Authenticate Demographic Faces?"** Presented in *ICPR 2024 Workshop: FAIRBIO: Fairness in Biometric Systems*, Kolkata, [Proceeding will come in Springer LNCS.][Link]

  - Anuradha Banerjee, **Abu Sufian,** and Marco Leo **"Machine Learning Approaches for Analyzing Physiological Data in Remote Patient Monitoring"** In *ECCV 2024 Workshop: Assistive Computer Vision and Robotics*, Milan, September 29- October 4, 2024. Proceeding in Springer LNCS. [Link]

  - Ekram Alam, **Abu Sufian,** Paramartha Dutta, Marco Leo**. "Human Fall Detection using Transfer Learning-based 3D CNN."** In the *International Conference on Computational Technologies and Electronics (ICCTE-2023)* 23-25th November 2023, hosted at the University of North Bengal, Siliguri, India, the Proceeding will come in Springer CCIS Series. [Link]

  - Farhana Sultana, **Abu Sufian** and Paramartha Dutta**. "d-RIMNet: RIMNet with Depthwise Separable Convolutional Layer for Retinal OCTA Image Segmentation."** In *International Conference on Computational Technologies and Electronics (ICCTE-2023)* 23-25th November 2023, hosted at the University of North Bengal, Siliguri, India, the Proceeding will come in Springer CCIS Series. [Link]

  - **Abu Sufian,** Anirudha Ghosh, Debaditya Barman, Marco Leo, Cosimo Distante and Baihua Li **"FewFaceNet: A Lightweight Few-Shot Learning-based Incremental Face Authentication for Edge Cameras"** In *ICCV 2023 Workshop: Assistive Computer Vision and Robotics*, Paris, October 2 - 6, 2023. Proceeding in IEEE Xplore. [Link]

- Ekram Alam, **Abu Sufian,** Paramartha Dutta, Marco Leo. **"Real-Time Human Fall Detection using a Lightweight Pose Estimation Technique"** In *5th CICBA 2023 27-28th Janunary, 2023,* hosted at Kalyani Govt. Engineering College, Kalyani, India, Proceecinf in Springer CCIS Series. [Link]

- Farhana Sultana, **Abu Sufian** and Paramartha Dutta**. "Automatic Diabetic Retinopathy Lesion Segmentation in UW-OCTA Images using Transfer Learning"** In MICCAI 2022 Grand-challenge: *DRAC22*, September 18–22, 2022, Singapore. Proceeding in Springer LNCS [Link]

- Farhana Sultana, **Abu Sufian** and Paramartha Dutta**. "RIMNet: Image Magnification Networks with Residual Block for Retinal Blood Vessels Segmentation"** In *TENSYMP 2022,* hosting at Indian Institute of Technology Bombay, July 1-3, 2022, Proceeding in IEEE Xplore [Link]

- **Abu Sufian,** Changsheng You, and Mianxiong Dong. **"A Deep Transfer Learning-based Edge Computing Method for Home Health Monitoring"** In *55th Annual Conference on Information Sciences and Systems (CISS)* hosted at Johns Hopkins University (Online), March 24-26, 2021, Proceeding in IEEE Xplore [Link]

- Ekram Alam, **Abu Sufian**, Akhil Kumar Das, Arijit Bhattacharya, Md Firoj Ali, and MM Hafizur Rahman. **"Leveraging Deep Learning for Computer Vision: A Review"**, In *22nd International Arab Conference on Information Technology (ACIT)*, Muscat, Oman, December 21-23, 2021, Proceeding in IEEE Xplore [Link]

- **Abu Sufian**, Anuradha Banerjee, and Paramartha Dutta. **"HFAIR: Hello Devoid Optimized Version of FAIR Protocol for Mobile Ad hoc Networks."** *Intelligence Enabled Research: DoSIER, August 12-13,* 2020, Proceeding in Springer [Link].

- **Abu Sufian**, Anuradha Banerjee, and Paramartha Dutta. **"A Tree Multicast Routing Based on Fuzzy Mathematics in Mobile Ad-Hoc Networks**." In *International Conference on Computer Communication and Internet of Things (ICCCIoT)*, Tripura University, Agartala, Springer LNNS Series, (2020). [Link]

- Farhana Sultana, **Abu Sufian,** and Paramartha Dutta**. "Advancements in Image Classification using Convolutional Neural Network"** In *4thInternational Conference on Research in Computational Intelligence and Communication Networks (ICRCICN),* hosted at RCC Institute of Information Technology, Kolkata, IEEE Xplore, (2018). [Link]

- **Abu Sufian**, Anuradha Banerjee, and Paramartha Dutta. **"FSNRP: Fuzzy-controlled Priority Scheduling of Non-real Time Data Packets in Mobile Ad-hoc Networks**." In *11th IEEE International Conference on Advanced Networks and Telecommunications Systems (ANTS)*, pp. 1-5. IEEE Xplore, (2017). [Link]

- **Journal Paper:**

  - Anirudha Ghosh, Deabditya Barman, **Abu Sufian**, & Ibrahim A. Hameed. **(2024). "Advancing Optical Character Recognition for Low-Resource Scripts: A Siamese Meta-Learning Approach with PSN Framework"** has been accepted for publication in IEEE Access, [Link]

- Ekram Alam, **Abu Sufian,** Paramartha Dutta, Marco Leo, and Ibrahim A. Hameed. "**GMDCSA-24: A Dataset for Human Fall Detection in Videos**", Data in Brief, Elsevier, Vol 57,110892, (2024). [Link]

- Anuradha Banerjee, **Abu Sufian**, Paramartha Dutta, and MMH Rahman. "**Minus HELLO: HELLO Devoid Protocols for Energy Preservation in Mobile Ad-hoc Networks.**" *Sustainable Computing: Informatics and Systems,* Elsevier, Vol 26, 100852, (2023). [Link]

- Anuradha Banerjee, Sachin Kumar Gupta, Parul Gupta, **Abu Sufian**, Ashutosh Srivastava, Manoj Kumar. "**UAV-IoT collaboration: Energy and time-saving task scheduling scheme.**" *Int J Commun Syst*., Wiley, Vol 36(14):e5555, (2023). [Link]

- Anuradha Banerjee, **Abu Sufian**, Ashutosh Srivastava, Sachin Kumar Gupta, Saru Kumari, and Sachin Kumar. "**An Energy and Time-Saving Task Scheduling Algorithm for UAV-IoT Collaborative System**." Microprocessors and Microsystems, Elsevier, 104875, (2023). [Link]

- Subhankar Ghosh, Anuradha Banerjee, **Abu Sufian**, Sachin Kumar Gupta, S. H. Alsamhi, and Abdu Saif. "Efficient selfish node detection using SVM in IoT-MANET environment." Transactions on Emerging Telecommunications Technologies, Wiley, e4858 (2023). [Link]

- M Al-Naeem, MH Rahman, Anuradha Banerjee, and **Abu Sufian**. "**Support vector machine-based energy-efficient management of UAV locations for aerial monitoring of crops over large agriculture lands.**" *Sustainability*, MDPI, 15(8), 6421, (2023). [Link]

- MH Rahman, M Al-Naeem, Anuradha Banerjee, and **Abu Sufian**. "**EETO-GA: Energy Efficient Trajectory Optimization of UAV-IoT Collaborative System Using Genetic Algorithm.**" *Applied Sciences*, MDPI, 13(4), 2535, (2023). [Link]

- Ekram Alam, **Abu Sufian,** Paramartha Dutta, and Marco Leo. "**Vision-based Human Fall Detection Systems using Deep Learning: A Review**", *Computers in Biology and Medicine*, Elsevier, 105626 (2022). [Link]

- Md Sarfaraz Momin, **Abu Sufian**, Debaditya Barman, Paramartha Dutta, Mianxiong Dong, and Marco Leo. "**In-home older adults' activity pattern monitoring using depth sensors: A review",** *Sensors,* MDPI, 22, no. 23: 9067, (2022). [Link]

- **Abu Sufian,** Anirudha Ghosh, Avijit Naskar, Farhana Sultana, Jaya Sil, MMH Rahman. "**BDNet: Bengali Handwritten Numeral Digit Recognition based on Densely Connected Convolutional Neural Networks**" *Journal of KSU - Computer and Information Sciences,* Elsevier, Volume 34, Issue 6, Part A, (2022). [Link]

- Subhankar Ghosh, Anuradha Banerjee, **Abu Sufian**, and Sachin Kumar Gupta. "**Autoregressive moving average based anycast with support vector machine clustering in mobile ad-hoc networks**", *Transactions on Emerging Telecommunications Technologies*, Wiley, 33, no. 4): e4432, (2022). [Link]

- Anuradha Banerjee, **Abu Sufian,** Krishna Keshob Paul, and Sachin Kumar Gupta. "**EDTP: Energy and Delay Optimized Trajectory Planning for UAV-IoT Environment.**" *Computer Networks*, Elsevier, Volume 202, 108623, (2021). [Link]

- Anuradha Banerjee, **Abu Sufian**, Ali Safaa Sadiq, and Seyedali Mirjalili. "**Minimum Energy Transmission Forest based Geocast in Software-Defined Wireless Sensor Networks.**" *Transactions on Emerging Telecommunications Technologies,* Wiley, 32 (9), e4253, (2021). [Link]

- Anuradha Banerjee and **Abu Sufian**. "**Smart-Green-Mult (SGM): Overhear from Topological Kingpins in Software Defined Wireless Sensor Networks**." *Journal of Ambient Intelligence and Humanized Computing,* Springer, 12.1, 87-404, (2021). [Link]

- **Abu Sufian,** Anirudha Ghosh, Ali Safaa Sadiq, and Florentin Smarandache. "**A Survey on Deep Transfer Learning to Edge Computing for Mitigating the COVID-19 Pandemic**" *Journal of Systems Architecture,* Elsevier, Vol 108, 101830, (2020). [Link]

- Farhana Sultana, **Abu Sufian,** and Paramartha Dutta. "**Evolution of Image Segmentation using Deep Convolutional Neural Network: A Survey**" *Knowledge-Based Systems,* Elsevier, Vol 201-202, 106062, (2020*).* [Link]

- Rahman, MM Hafizur, Mohammed Al-Naeem, Mohammed NM Ali, and **Abu Sufian**. "**TFBN: A Cost Effective High-Performance Hierarchical Interconnection Network**", Applied Sciences, MDPI, 10, no. 22: 8252, (2020). [Link]

- **Abu Sufian**, Anuradha Banerjee, and Paramartha Dutta. "**Energy and Velocity based Tree Multicast Routing in Mobile Ad-hoc Networks**." *Wireless Personal Communications,* Springer, Vol 107, no. 4, 2191-2209 (2019). [Link]

- Anuradha Banerjee, Paramartha Dutta, and **Abu Sufian. "Movement guided management of topology (MGMT) with balanced load in mobile ad hoc networks."** *International Journal of Information Technology***,** Springer, Vol 11: 149-158 (2019). [Link]

- **Abu Sufian**, Anuradha Banerjee, and Paramartha Dutta. "**Cheat-Proof Communication through Cluster Head (C3H) in Mobile Ad Hoc Network.**" *Pertanika Journal of Science and Technology,* University Putra Malaysia, Vol 26, no. 3, 1513-1526, (2018). [Link]

- Anuradha Banerjee, **Abu Sufian**, and Paramartha Dutta. "**EMR-PL: Energy-efficient Multipath Routing based on Link Life Prediction in Ad-hoc Networks**", *Journal of Information and Optimization Sciences,* Taylor & Francis, 39, no. 1: 285-301, (2018). [Link]

- Anuradha Banerjee, Paramartha Dutta, and **Abu Sufian. "Fuzzy-controlled energy-efficient single hop clustering scheme with (FESC) in ad hoc networks."** *International Journal of Information Technology***,** Springer, Vol 10: 313-327 (2018). [Link]

- **Book Chapter:**

  - **Abu Sufian,** Ekram Alam, Anirudha Ghosh, Farhana Sultana, Debashis De, and Mianxiong Dong. "**Deep Learning in Computer Vision through Mobile Edge Computing for IoT**." *Mobile Edge Computing,* Springer, Chapter 18, pp. 443-471, (2021). [Link]

  - Anirudha Ghosh, **Abu Sufian,** Farhana Sultana, Amlan Chakrabarti, and Debashis De. **"Fundamental Concepts of Convolutional Neural Network"** *In Recent Trends and Advances in Artificial Intelligence and Internet of Things,* Springer, Chapter 36, pp. 519-567, (2020). [Link]

- **Abu Sufian,** Dharm Singh Jat, and Anuradha Banerjee. **"Insights of Artificial Intelligence to Stop Spread of COVID-19"** *In Big Data Analytics and Artificial Intelligence Against COVID-19: Innovation Vision and Approach,* Springer, Chapter 11, pp. 177-190, (2020). [Link]

- Farhana Sultana, **Abu Sufian,** and Paramartha Dutta. **"A Review of Object Detection Models based on Convolutional Neural Network"** *In Intelligent Computing: Image Processing Based Applications,* Springer, Chapter 1, pp. 1-16, (2020). [Link]

Sponsored Project:

Role	Number of Project
Researcher:	01
Consultant:	03

Event Organized/Organizing (Selective):

- Worked as a **Technical Program Committee Member** to organize the **12th International Workshop on Assistive Computer Vision and Robotics (ACVR 2024)** in Conjunction With **ECCV 2024,** Milan, September 29 to October 04, 2024.

- Worked as a **Technical Program Committee Member** to organize the **11th International Workshop on Assistive Computer Vision and Robotics (ACVR 2023)** in Conjunction With **ICCV 2023,** Paris, in the first week of October 2023.

- Worked **as Jt. Convener** to organize an **IEEE CIS DLP,** on "**Convolutional Networks for Medical Image Analysis: Its Past Future, and Issues.**" **A flagship program of IEEE CIS** at University of Gour Banga with a technical collaboration with IEEE CIS Kolkata chapter at Virtual (online) on 17th September 2020.

- Worked **as Organizing Secretary & Program Chair** to organize **"One Day workshops on IoT Analytics & Mobile Crowd Sensing"** at University of Gour Banga with technical collaboration with the Computer Society of India Kolkata chapter on 29th March 2019.

- Worked as **Coordinator** to organize "**One Day Special Lecture on Learning using Shallow to Deep Architecture"** at University of Gour Banga on 15th June 2018.

- Worked as Convener to organize "**One Day National Symposium on Recent Trends in Computational Intelligence"** at University of Gour Banga with the technical collaboration with IEEE CIS Kolkata chapter on 15th June 2017**.**

Faculty Training/Short-term Course/Workshop/Skill Development Program Completed:

- **Faculty Training:**

- UGC Sponsored Refresher Course in **Computer Science and Information Technology** at Human Resource Development Centre (HRDC), University Of Madras, 11th February – 24th February 2022.

- UGC Sponsored **Faculty Orientation Programme** at Human Resource Development Centre (HRDC), Pandit Ravishankar Shukla University, 9th November – 29th November 2019.

- **Short term Course:**

  - Self-Paced Online Certification Course on **"Generative AI: Impact, Considerations, and Ethical Issues",** offered by IBM through Coursera, started in March 2024.

  - Self-Paced Online Certification Course on **"AI in Healthcare Specialization",** offered by Stanford University through Coursera, started in 2021.

  - Online Four Week Certification Course on **"The Postdoc Academy: Succeeding as a Postdoc",** offered by Boston University with EDX, July - August 2020.

  - Three days "**Bhuvan Overview Training**" offered by National Remote Sensing Centre, ISRO, India, October 2019.

  - Self-paced online Certification Course on **"Deep Learning Specialization: Master Deep Learning, and Break into AI"** offered by deeplearning.ai through Coursera from 20th March 2019.

  - Four weeks NPTEL Online Certification Course on **"Machine Learning"** under NPTEL, offered by KTH Royal Institute of Technology, Stockholm, February - April 2019.

  - One-week AICTE Recognized Short Term Course on **"Python Programming"** held at National Institute of Technical Teachers Training & Research, Chandigarh, 12th – 16th November 2018.

  - Eight weeks NPTEL Online Certification Course on **"Deep Learning"** under NPTEL FDP offered by Indian Institute of Technology Madras (IIT-M), August - October 2018.

- **Workshop and Skill Development Programme:**

  - One Week Advanced Entrepreneurship and Skill Development Programme (A-ESDP) on "**Smart Healthcare Systems using IoT and AI/ML"** Funded by Ministry of MSME, Government of India Organized by National Institute of Technology Sikkim on 27th February – 2nd March 2024.

  - Three-day workshop on "**MACHINE LEARNING AND DATA ANALYTICS**" Organized by the Department of Computer Science & Engineering, Jadavpur University on 26th - 28th March 2019.

  - One Day Symposium on "**Some New Research Directions in Machine Learning & Machine Intelligence**" Jointly Organized by IEEE Kolkata Chapter and Dept. of Computer & System Science, Visva-Bharati University, W.B. on 25th February 2017.

  - One day International Seminar on **Intelligent Computing (ISIC 2017),** organized by Dept. of Information Technology, Jadavpur University, W.B. under MIC of UGC-II with technical collaboration with IEEE CIS, Kolkata Chapter, on 16th December 2017.

  - One-day Seminar on **Big Data Analytics: Research Scopes, Issue, and Challenges**, organized by B.P. Poddar Institute of Management and Technology in collaboration with M.A.K.A.U.T, W.B., on 9th August 2017.

  - Two-day workshop on "**Scientific document writing using LaTeX**" held at Aliah University with CSI, Kolkata Chapter, and Aliah University, Kolkata, West Bengal on 11th - 12th February 2017.

Invited Talk and Presentation:

- **Invited Talk** on Best Practices at Different Stages of Machine Learning Models at **One day Seminar on IoT and Machine Learning** Organized by Department of Computer Science and Applications, Malda College, Malda, India, 10th January 2024.

- **Invited Talk** on Deep Learning in Edge Computing for Vision-based In-home Care: Scopes & Challenges at the **Two-Day National Webinar on Application of Computational Statistics in Modern Era** at Vidyasagar University, Midnapore, India 2nd -3rd September 2022.

- **Invited Talk** on Deep Learning to Edge Computing to Mitigate pandemics at the **One day Webinar on Efficacy and Importance of IT in COVID-19 pandemic Condition** Organized by Department of Computer Science and Applications, Malda College, Malda, India, 28th July 2020.

- **Invited Talk** on Article Writing using LaTeX at the **National Symposium on Foundation and Advances in Research Methods & Computing (NSFARAC 2019)**, Raiganj University, India, 13th - 14th May 2019.

- **Invited Talk** on Technology in Education at the **One Day International Seminar on ICT** jointly organized by the Dept. of Mathematics and the Computer Science & Applications, Malda College, West Bengal, India, 24th Sept, 2018.

- **Oral Presentation** at the **ICPR 2024 Workshop: FAIRBIO - Fairness in Biometric Systems,** Kolkata 1st - 5th December 2024.

- **Oral Presentation via online** at the **55th Annual Conference on Information Sciences and Systems (CISS-2021)** hosted by the Department of E.C.E., Johns Hopkins University and Technical Co-sponsorship by the IEEE Information Theory Society, 24th - 26th March 2021.

- **Oral Presentation** at the **International Conference on Computer Communication and Internet of Things (ICCCIoT 2020)** held at Tripura University, Agartala, India 3rd - 4th February 2020.

- **Oral Presentation** at **Second International Conference on Communication, Devices and Computing (ICCDC 2019)** held at the Haldia Institute of Technology (HIT), W.B., India 14th - 15th March 2019.

- **Oral Presentation** at **First International Conference on Smart Technologies in Computer and Communication (SmartTech-2017)** Amity University Rajasthan, Jaipur, India, 27th – 29th March 2017.

- **Oral Presentation** at **International Conference on Industry Interactive Innovations in Science, Engineering and Technology (I3SET-2K16)**, JIS College of Engineering, Kalyani, India, 25th -26th October 2016.

Membership in Scientific and Professional Society:

- Professional Member of **IEEE** and the **IEEE CIS** (since 2017, member ID 94491064).

- Professional Member of IEEE Biometrics Council (since 2024, member ID 94491064).

- Executive Committee Member of **IEEE CIS,** Kolkata Chapter (For the Years 2021 & 2022).

- Lifetime Member of the **Computer Society of India** (since 2017, member ID I1510614).

Fellowship Awarded & Eligibility Accrued:

- Awarded **Postdoctoral Fellowship** by CNR-ISASI, Italy, through a public competition for the years 2024-25 to work on the project "Future Artificial Intelligence Research – FAIR (Extended Partnership 01: Artificial Intelligence: Aspects Foundational - PE 0000013, CUP B53C22003630006) Mission 04 Education and Research – Component 2 From Research to Business - investment 1.3 NextGenerationUE" Funded by the European Union – Next Generation EU.

- Qualified **West Bengal State Eligibility Test (WBSET) 2014 (**the state-level eligibility examination conducted by the West Bengal College Service Commission (WBCSC) for the post of Assistant Professor in the colleges and universities of West Bengal, India).

- Awarded **Merit-cum-Means Scholarship**, Govt. of India to Pursue Master Degree during 2007-2010.

Date: December 3, 2024