

Jamuna Srinivasa Murthy

Assistant Professor
Department of CSE
M S Ramaiah Institute of Technology

<https://jamunasmurthy.github.io>
jamunamurthy.s@gmail.com
jamuna@msrit.edu

Education

M S Ramaiah Institute of Technology 2015 – 2017
Autonomous Affiliated to Visvesvaraya Technological University
M. Tech in Computer Software Engineering (GPA: 9.30/10.0)

Dr. Ambedkar Institute of Technology 2011 – 2015
Autonomous Affiliated to Visvesvaraya Technological University
BE in Computer Science and Engineering

Work Experience

M S Ramaiah Institute of Technology 2022 – Present
Assistant Professor, Department of CSE
Lab Affiliation: Center for Imaging Technologies

BNM Institute of Technology 2020 – 2022
Assistant Professor, Department of ISE
Lab Affiliation: Head, Google Cloud Center of Excellence

PES University 2018 – 2020
Assistant Professor, Department of CSE
Lab Affiliation: Centre for Data Science & Applied ML (CDSAML)

Indian Institute of Science 2017 – 2018
Research Assistant, Department of CDS

Research Interests

Multimodal AI, Video Analytics, Agentic AI Systems, and Scalable AI Systems.

Industry Research Collaborations

AI Researcher, Verity Labs — AI-ACC-Stack *Apr 2025 – Sep 2025*
Worked on a modular AI backend stack involving RAG, LLM integration, document ingestion, tool-calling agents, structured querying, authentication, and deployable AI services.

Faculty Mentor, Samsung PRISM *June 2024 – May 2025*
Worked on the “Expression Correction in Photos” project, developing GAN-based affective computing models for emotion-aware image enhancement.

Selected Publications [[Google Scholar](#)]

- **Jamuna S Murthy**, Dhanashekar Kandaswamy, Wen Cheng Lai. *Towards Secure Video Surveillance: Few-Shot Spatiotemporal Perception Transformer for Unseen Behavioral Anomalies*. AVSS 2025. [[Paper](#)].

- **Jamuna S Murthy**, Siddesh GM. *Multimedia Video Analytics using Deep Hybrid Fusion Algorithm*. Journal of Multimedia Tools and Applications 2025. [[Paper](#)].
- **Jamuna S Murthy**, Siddesh GM. *A Smart Video Analytical Framework for Sarcasm Detection using Adaptive Fusion and SarcasNet-99*. Journal of The Visual Computer 2024. [[Paper](#)].
- **Jamuna S Murthy**, Siddesh GM, Wen Cheng Lai et. al. *ObjectDetect: A Real-Time Object Detection Framework for Advanced Driver Assistant Systems Using YOLOv5*. Journal of Wireless Communications and Mobile Computing 2022. [[Paper](#)].
- **Jamuna S Murthy**, Siddesh G M, K G Srinivasa. *TwitSenti: a real-time Twitter sentiment analysis and visualization framework*. Journal of Information & Knowledge Management 2019. [[Paper](#)].
- **Jamuna S Murthy**, Siddesh G M, K G Srinivasa. *A real-time twitter trend analysis and visualization framework*. International Journal on Semantic Web and Information Systems (IJSWIS) 2019. [[Paper](#)].

Patent(2025)

- **Jamuna S Murthy**, Dhanashekar Kandaswamy, Siddesh G M. "Surgeon's Eye: Intelligent Video Analytical Framework for Robotic and Laparoscopic Surgery(202541008338).

Award and Honors

- TEQIP-funded Graduate Teaching Assistantship *June 2016 – June 2017*
- Best Master Thesis Award *May 2017*
- Young Researcher Award by STEM Research Society [[Link](#)] *Nov 2024*

Academic Service

- Reviewer: AAAI, ACM MM, ACM Multimedia Asia, CVPR, ECCV, ICLR, ICME, WACV, Springer Nature.
- Faculty Sponsor, RIT ACM Student Chapter [[Link](#)] *2023 – Present*
- Lifetime Member, Indian Society for Technical Education (ISTE)

Teaching

Undergraduate:

Artificial Intelligence and Machine Learning

Deep Learning

Cloud Computing and Big Data